COLOUR ATLAS

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Eighteenth Edition

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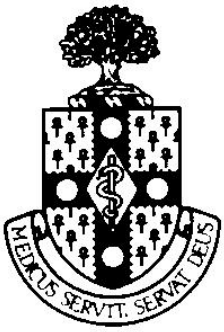

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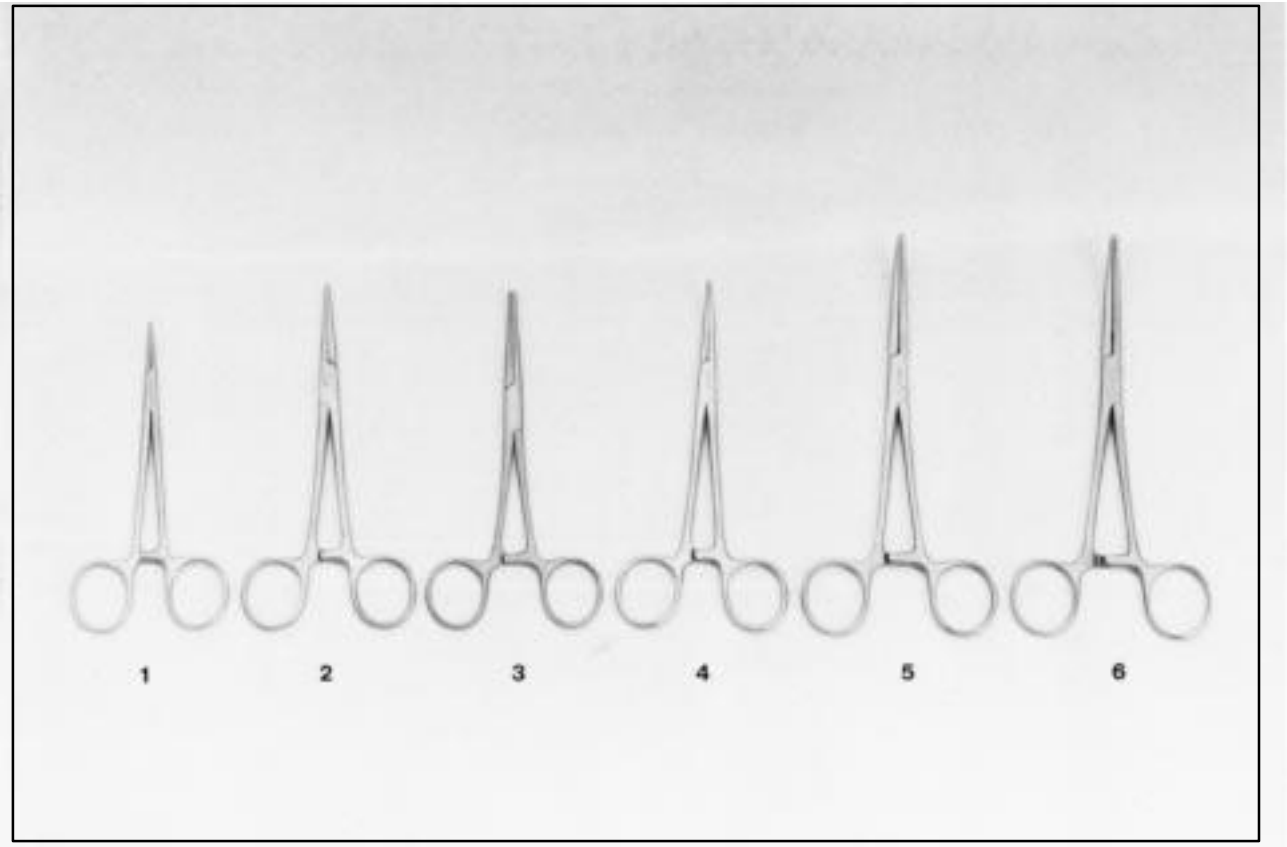
GENERAL INSTRUMENTATION

HEMOSTATIC FORCEPS



1. Halsted Mosquito Forceps 2. Crile Hemostatic Forceps 3. Ochsner Artery Forceps
4. Kelly Hemostatic Forceps 5. Pean Hemostatic Forceps 6. Carmalt Hemostatic Forceps

- Hemostatic Forceps are called hemostats, artery forceps, clamps, hemostatic forceps and sometimes may be referred to as "snaps". Their main purpose is to achieve hemostasis (control of the flow of blood).
- After a hemostat has been secured to a blood vessel, generally either a suture is tied around the vessel or electrocautery is applied to the end of the vessel to achieve final hemostasis.

Photos and text in the General Instrumentation section are provided courtesy of the V. Mueller Division of Allegiance Healthcare Canada Corporation, Inc. V. Mueller is a global market leader in surgical instrument manufacturing, instrument management services and sterile processing supplies.

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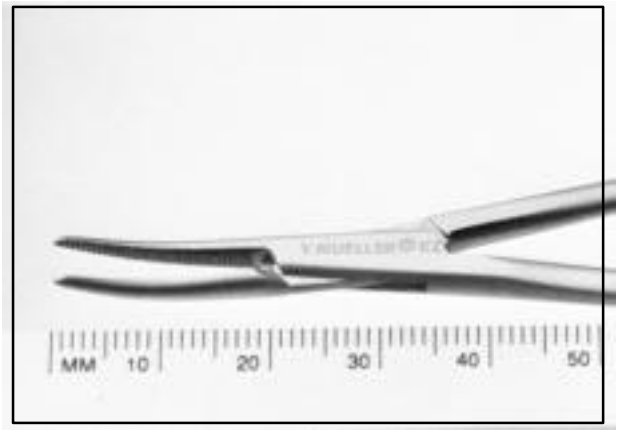


Proper Name
- Halsted Mosquito Forceps

Common Name
- Mosiqutos, Snaps, Hemostats, Stats, Clamps, Clips

Features
- Jaws-short and pointed
- Horizontal serrations
- Straight or curved

Uses
- To clamp off smaller vessels, for example in pediatric surgery. These forceps can be used in all types of surgery for small vessel occulsion. They should not be used on larger vessels, as the blades become distorted and non-functional. They are also used to perform some blunt dissection.

Proper Name
- Crile Hemostatic Forceps

Common Name
- Criles, Clamps

Features
- Horizontal serrations
- Straight or curved

Uses
- Occlusion of vessels and some blunt dissection. Often confused with or referred to as Kelly forceps.

Proper Name
- Ochsner Artery Forceps

Common Name
- Ochsner, Kocher

Features
- Tips ~ 1 x 2 teeth
- Horizontal serrations
- Straight or curved

Uses
- Primarily for grasping and holding heavy tissue (i.e., broad ligaments). Longer length is suitable for deep cavities.

Proper Name
- Kelly Hemostatic Forceps

Common Name
- Kellys, Snaps, Clamps

Features
- Horizontal serrations
- Straight or curved

Uses
- Occlusion of vessels and some blunt dissection.

Proper Name
- Pean Hemostatic Forceps

Common Name
- Peans, Large Forceps

Features
- Horizontal serrations
- Straight or curved

Uses
- Occludes or clamps larger vessels or tissues. Peans can be quite traumatic and for that reason are generally used on tissue to be resected.

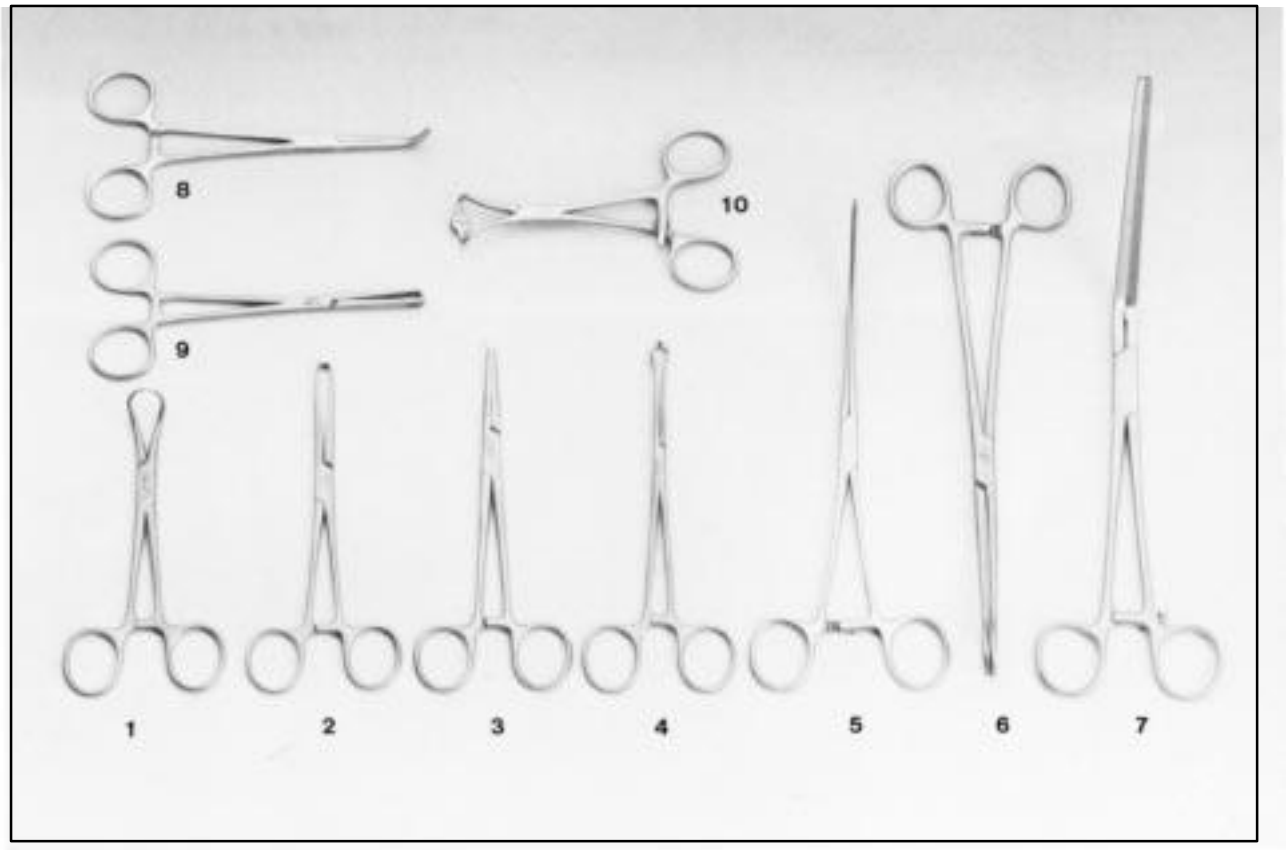
Proper Name
- Carmalt Artery Forceps

Common Name
- Carmalt, Crushing Clamps, Stars and Stripes, Hose Clamps

Features
- Tips - diamond serrations
- Vertical serrations
- Straight or curved

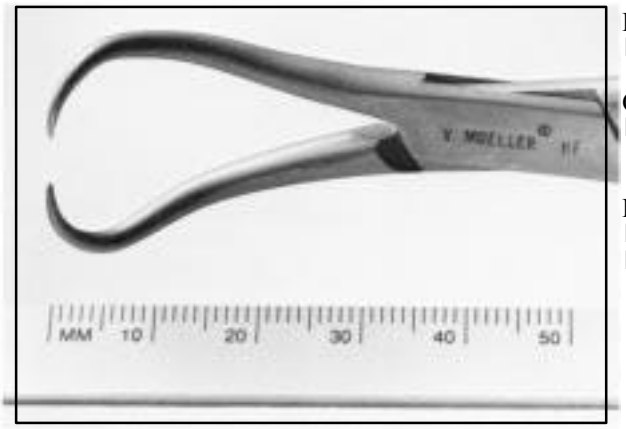
Uses
- A tissue crushing instrument that is generally clamped on an organ or tissue to be resected, the Carmalt is used quite often in OB/GYN procedures; for instance in the removal of uterus.

OTHER SOFT TISSUE FORCEPS



1. Backhaus Towel Forceps 2. Allis Intestinal Forceps 3. Kocher Artery Forceps
4. Babcock Intestinal Forceps 5. Doyen Intestinal Forceps 6. Foerster Sponge Forceps
7. Glassman Non-Crushing Gastroenterostomy Clamp 8. Mixter Gall Duct Forceps
9. Lahey Goiter Forceps 10. Non-Perforating Towel Forceps

- Tissue forceps which are made like hemostats, with ring handles and ratchet locks, are used for holding and retracting soft tissue for longer periods. They are characterized by fine rounded teeth or ridges on the jaws and a more delicate grip which provides a secure hold with minimal injury (trauma) to the tissue.

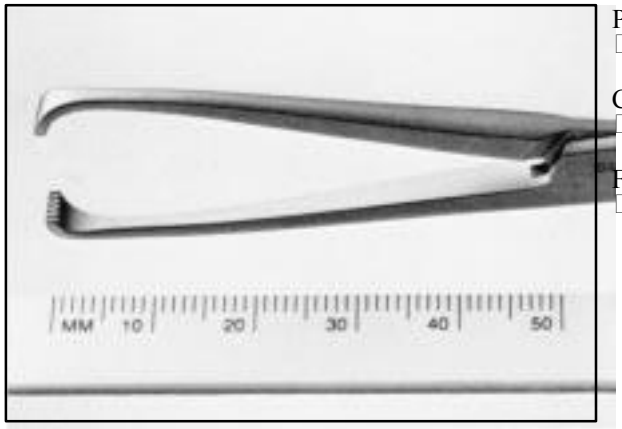


Proper Name
- Backhaus Towel Forceps

Common Name
- Backhaus Clamps, Towel Forceps, Towel Clamps

Features
- Tips - Sharp
- Jaws - rounded forming a half circle

Uses
- Holding towels and drapes in place during surgery. Will perforate anything clamped with it, including waterproof drapes and tissue.

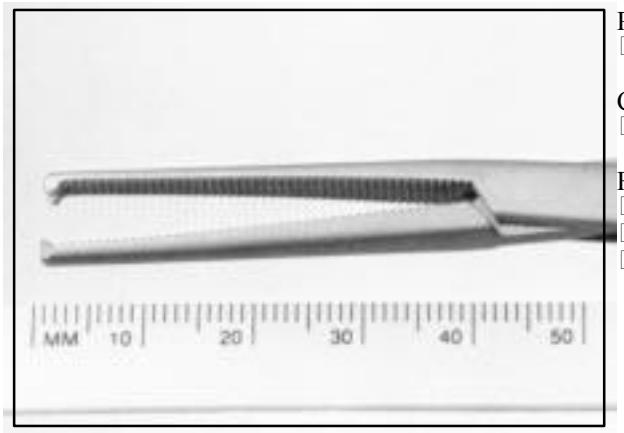


Proper Name
- Allis Intestinal Forceps

Common Name
- Allis, Allis Clamps

Features
- Tips - interlocking teeth

Uses
- To hold or retract tissue, most frequently, intestinal tissue. These forceps are more traumatic than Babcock forceps.

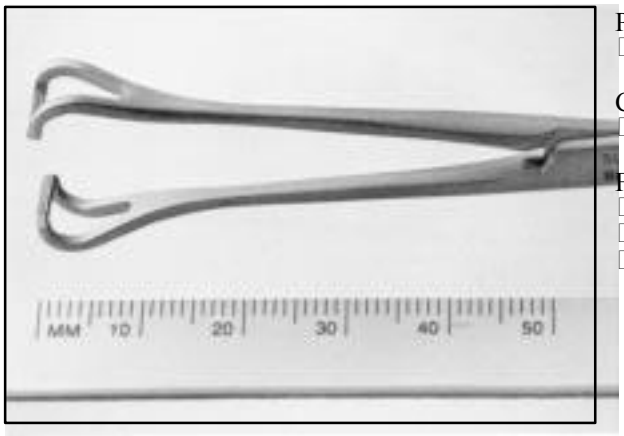


Proper Name
- Kocher Artery Forceps

Common Name
- Kocher, Kocher Clamps, Ochsner

Features
- Tips - 1x2 teeth
- Horizontal serrations
- Straight or curved

Uses
- Although called an artery forceps, this forceps is primarily used for grasping and holding heavy tissue such as abdominal muscle fascia.



Proper Name
- Babcock Intestinal Forceps

Common Name
- Babcock, Babcock Clamps

Features
- Tip - small half circle (from side)
- "V" shape (from front to back)
- Horizontal serrations

Uses
- Grasping and holding tissue such as stomach. Used frequently in abdominal procedures; this is the instrument of choice for grasping the appendix and fellopian tubes. Sometimes used to clamp over a vessel to isolate it.

Proper Name
- Doyen Intestinal Forceps

Common Name
- Doyen Clamps

Features
- Jaw - long, flexible
- Oblique serrations
- Straight or curved

Uses
- To clamp off a section of intestine without crushing tissue. Best suited for use on small intestine.

Proper Name
- Foerster Sponge Forceps

Common Name
- Sponge Sticks, Sponge Forceps, Sponge Clamps, Stick Forceps, Stick Clamps, Ring Forceps

Features
- Tip - oval - serrations/smooth
- Horizontal serrations

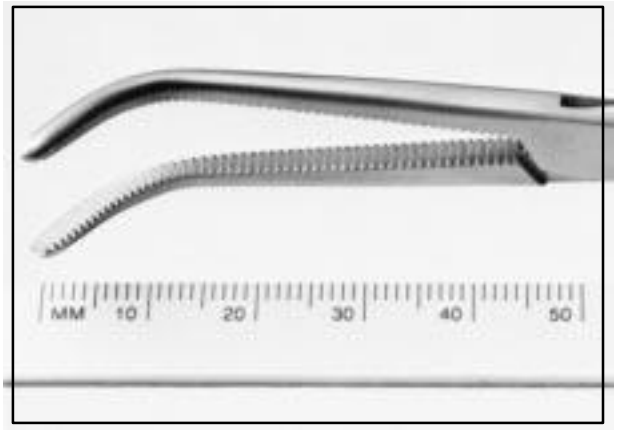
Uses
- To hold sponges securely during the preparation of patients or to sponge a wound during sugery. Also used to extract fetal placenta or to grasp non-delicate tissue.

Proper Name
- Glassman Non-Crushing Gastroenterostomy Clamp

Common Name
- Glassman, Stomach Clamp, Bowel Clamp

Features
- Jaws - microscopic teeth
- Horizontal serrations
- Straight or curved

Uses
- Primarily used in gastrectomy or gastric reduction procedures. Other Glassman non-crushing clamps have specialized indications for small intestine, duodenal and large bowel procedures.

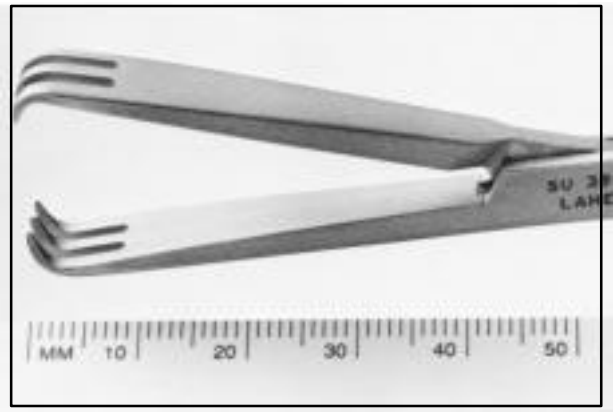


Proper Name
- Mixter Gall Duct Forceps

Common Name
- Mixter, Right Angle, Full Curve, Schnidt

Features
- Tip - rounded
- Horizontal serrations

Uses
- Primarily general and vascular surgery. Often helpful in placing sutures behind or around a vessel or duct. Secondarily used for the dissection of tissue.

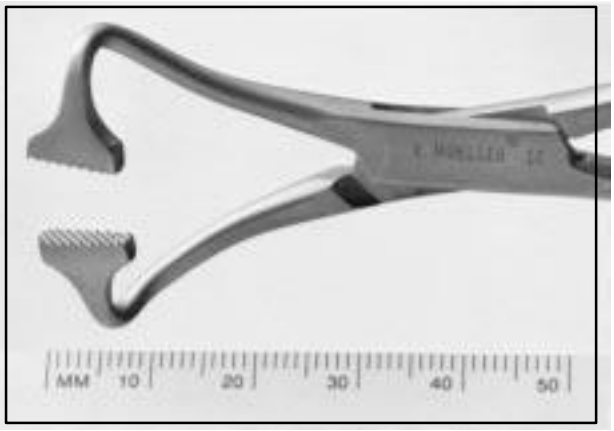


Proper Name
- Lahey Goiter Forceps

Common Name
- Lahey Clamp

Features
- Tip - 3x3 teeth
- Curved, sharp

Uses
- To grasp, without crushing, the goiter during thyroid procedures.



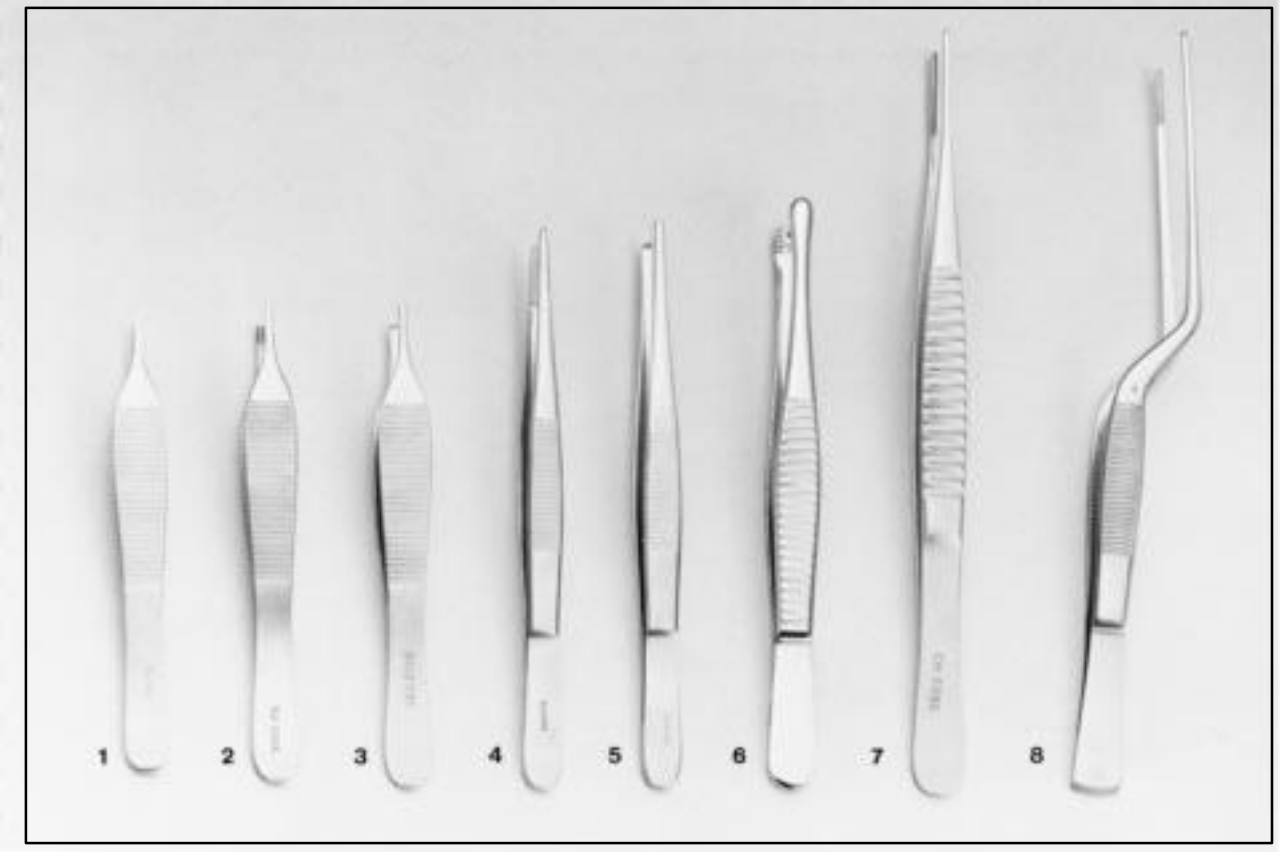
Proper Name
- Non-Perforating Towel Forceps

Common Name
- Atraumatic Towel Clamp

Features
- Diamond serrated oblong jaw

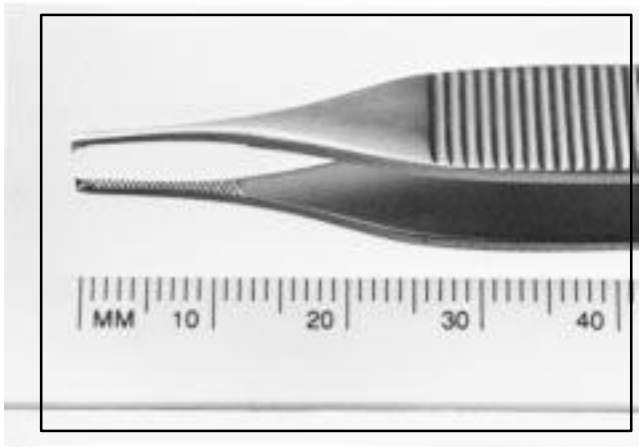
Uses
- To hold both disposable and cloth drapes and towels securely without tearing or perforating.

DRESSING AND OTHER SOFT TISSUE FORCEPS



1. Adson Tissue Forceps 2. Brown-Adson Tissue Forceps 3. Hudson Tissue Forceps
4. Dressing Forceps 5. Tissue Forceps 6. Russian Tissue Forceps 7. DeBakey Tissue Forceps
8. Cushing Dressing Tissue Forceps

- Thumb Forceps - These instruments have spring handles which are held closed by thumb and finger pressure.
- This type of forceps, is referred to as a thumb dressing forceps when the jaws are serrated and the instrument is used to grasp delicate tissue or wound dressings.
- This type of forceps is referred to as a thumb tissue forceps when the jaws have teeth, and instrument is used for grasping heavier tissue where the teeth will provide a more secure grasp.

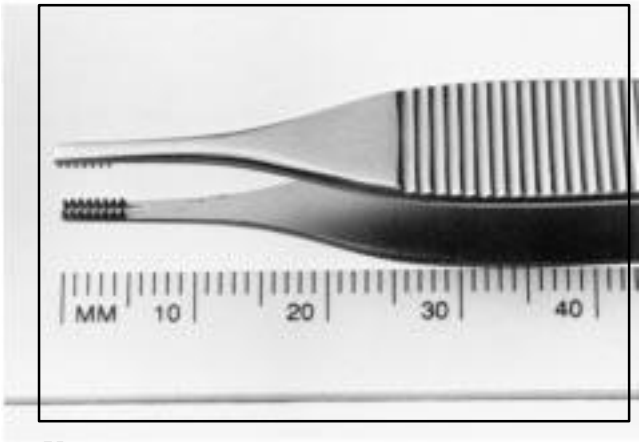


Proper Name
- Adson Tissue Forceps

Common Name
- Adsons, Small Pick Ups, Rat Tooth

Features
- Tips - 1x2 sharp interlocking teeth
- Jaws - fine, diamond serrations

Uses
- Grasping delicate tissue and skin.

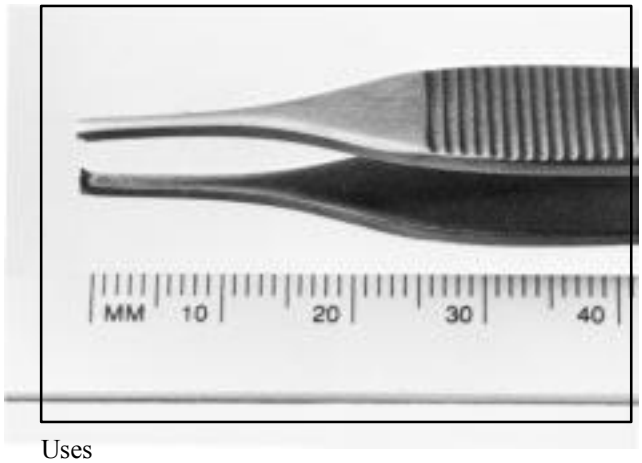


Proper Name
- Brown-Adson Tissue Forceps

Common Name
- Brown-Adson, Adson

Features
- Tip - two rows of interlocking teeth (lengthwise)
- Cutter shank - horizontal serrations

Uses
- Clamp force is distributed more evenly, thereby causing less trauma than Adson forceps. Used by ENT and Plastic surgeons for wound closure.

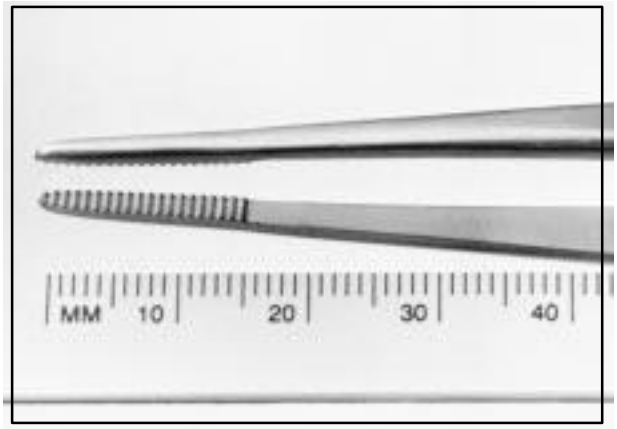


Proper Name
- Hudson Tissue Forceps

Common Name
- Adson

Features
- Tip - 1x2 interlocking teeth
- Cutter shank - horizontal serrations
- Heavier than Adson Tissue Forceps

Uses
- Most surgical procedures.

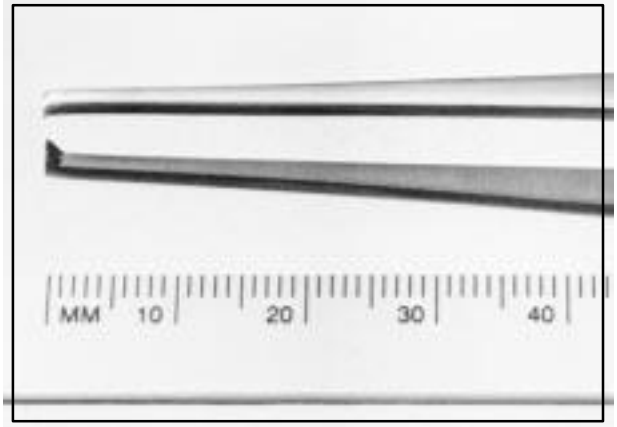


Proper Name
- Dressing Forceps

Common Name
- Dull Broad, Long Fingers, Pick-Ups

Features
- Jaws - horizontal serrations - round tips
- Cutter shank - horizontal serrations

Uses
- To hold gauze sponges and dressings, also delicate handling of tissue, for example, donated tissue and skin grafts.



Proper Name
- Tissue Forceps

Common Name
- Fine Tissue Forceps, Rat Tooth Pick-Ups, Lion Jaw

Features
- Tip - various interlocking teeth sizes
- Cutter shank - horizontal serrations

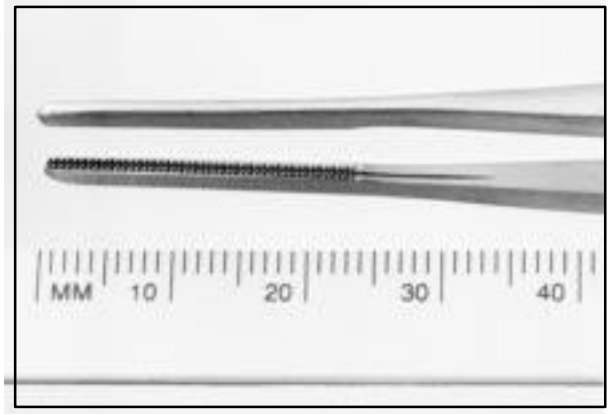
Uses
- Predominately plastic surgery.

Proper Name
- Russian Tissue Forceps

Common Name
- Russians, Russian Pick-Ups

Features
- Tips - rounded with deep circular interlocking serrations
- Cutter Shank - horizontal serrations

Uses
- Grasping tissue and organs. Widely used in OB/GYN applications (i.e. hysterectomies). May also be used on the skin and in cardiovascular procedures.

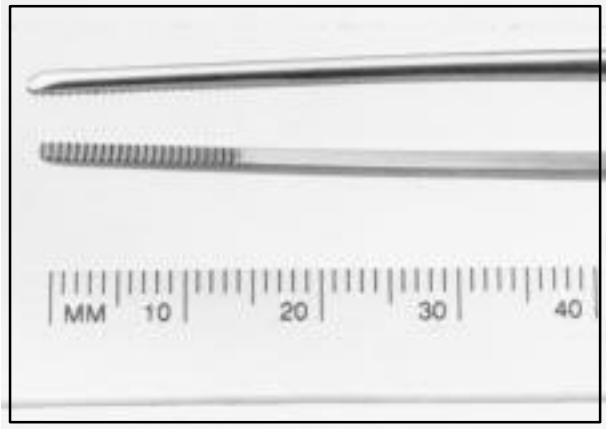


Proper Name
- DeBakey Tissue Forceps

Common Name
- DeBakeys, Atraumatic Pick Ups, Magics

Features
- Jaws - 1x2 interlocking microscope teeth - rounded tip
- Cutter shank - deep horizontal serrations

Uses
- Instument conducive for grasping delicate tissues, organs and vessels. Widely used in cardiovascular surgery, however, also used in other surgical procedures.



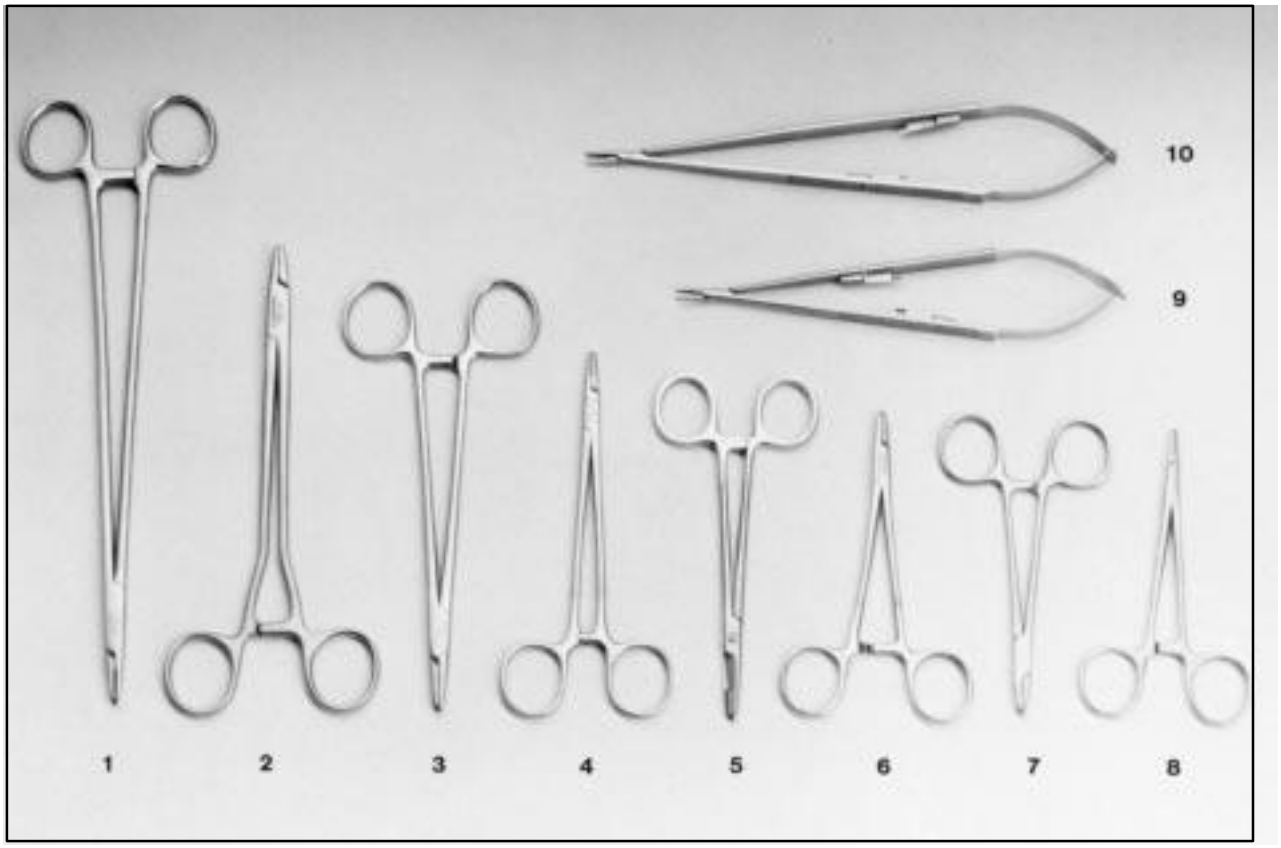
Proper Name
- Cushing Dressing Tissue Forceps

Common Name
- Bayonet

Features
- Bayonet or “S” shaped curve
- Jaws - horizontal serrating - blunt

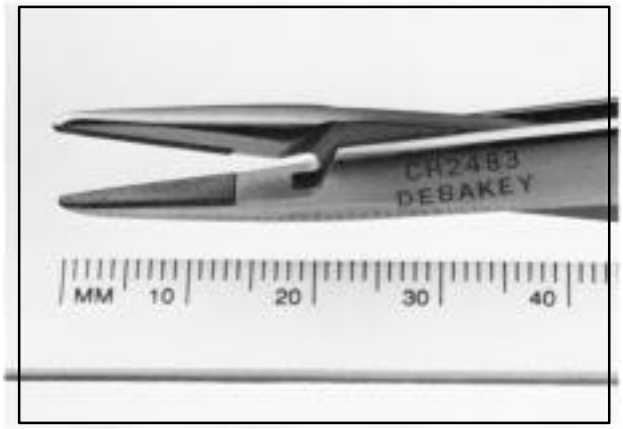
Uses
- Designed for use when maximum visibility to operative site is requied. Length also facilitates work in deep and poorly exposed areas. Proximal end of instrument is used for blunt dissection.

NEEDLE HOLDERS



1.DeBakey Vital® 2. Finochietto 3. Mayo-Hegar Vital® 4. Crile-Wood Vital®
5. Olsen-Hegar Vital® 6. Hegar-Baumgartner Vital® 7. Collier 8. Webster Vital®
9. Castroviejo Vital® 10. Castroviejo Vital® 8 1/2”

- Needle holders are mainly ring handled instruments similar to hemostats in appearance but with smaller jaws which are shorter and thicker.
- The purpose of needle holders is to securely hold surgical needles which are attached to sutures.
- Not all needle holders are ring handled. Spring handled needle holders are used in surgical procedures requiring delicate suturing in tight or poorly exposed areas of the body. Spring handled needle holders provide maximum result with minimum rotation of wrist and hand. Most spring handle holders will have a lock or catch to secure the needle.
- Gold handled needleholders is a universal standard indicating the needleholder has been manufactured with a tungsten carbide holding surface. The tungsten carbide surface provides a tighter grip and extends the durability of the instrument than conventional needleholders.

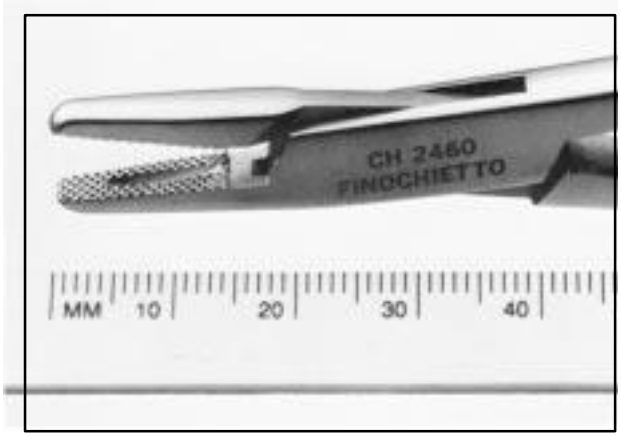


Proper Name
- DeBakey Vital Needle Holder

Common Name
- Needle Driver, Diamond Jaw

Features
- Tips narrower than Mayo-Hegar or Hegar Baumgartner
- Jaws - diamond serrated (3600 teeth 1/2 inch)

Uses
- General, thoracic, cardiovascular and vascular surgery. Shorter length pattern applicable to eye, plastic and neurosurgery; for use with needles with suture size 5-0 and 6-0.

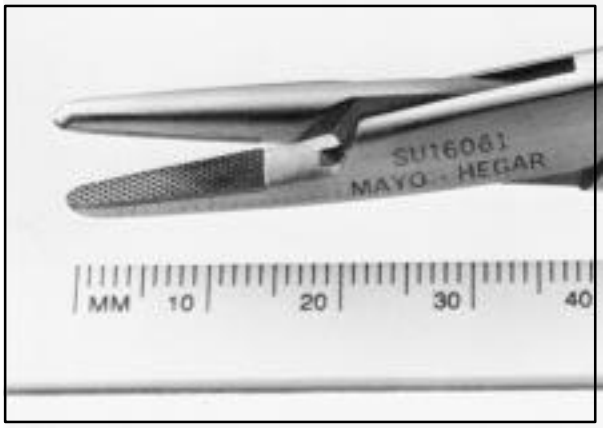


Proper Name
- Finochietto Needle Holder

Common Name
- OB/GYN Needle Holder, Heaney

Features
- Jaws - groove cut in center - diamond serrations - rounded tips

Uses
- Heavy needle holder frequently used in OB/GYN procedures.

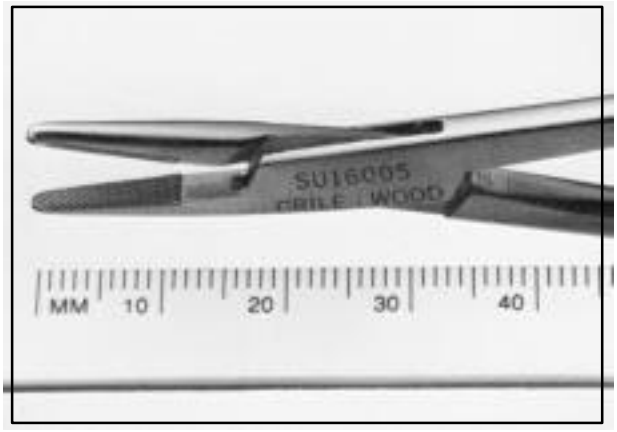


Proper Name
- Mayo-Hegar Vital Needle Holder

Common Name
- Mayo-Hegar, Needle Driver, Driver

Features
- Tips - rounded, straight
- Jaws - diamond serrated (2500 teeth 1/2 inch)

Uses
- To hold medium to heavy gauge needles. For holding fine needles with suture sizes up to 4-0.

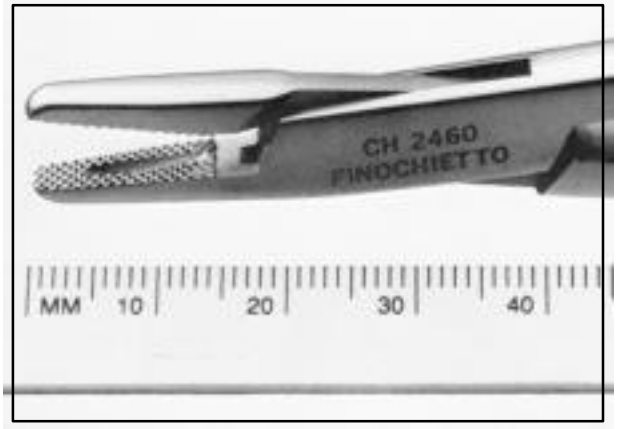


Proper Name
- Crile-Wood Vital Needle Holder

Common Name
- Vascular Needleholder, Needle Driver, Driver

Features
- Tip - thin, rounded, straight
- Jaws - diamond serrated (3600 teeth 1/2 inch)

Uses
- For holding fine needles with suture sizes 5-0 and 6-0. Frequently used in cardiovascular surgery.

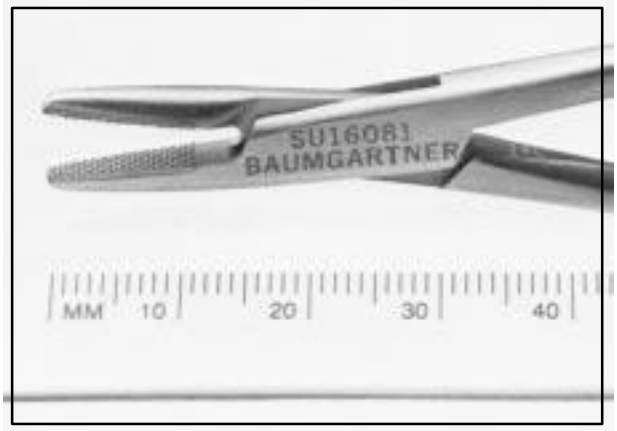


Proper Name
- Olsen-Hegar Vital Needle Holder

Common Name
- Olsen Needle Holder

Features
- Combination - scissor/needle holder
- Jaws - diamond serrated (2500 teeth 1/2 inch)

Uses
- This combination scissors-needle holder facilitates rapid suturing when limited support personnel present; for holding needles with suture size up to 4-0.

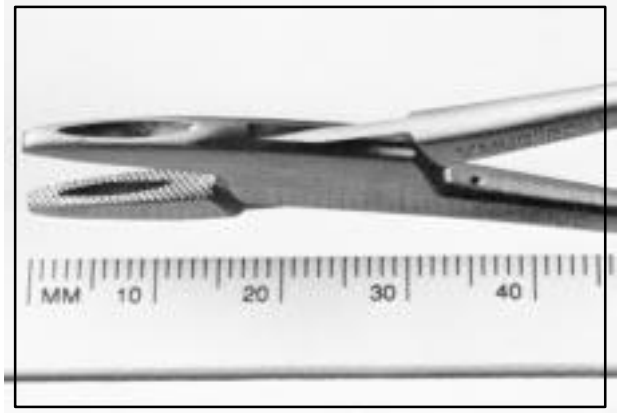


Proper Name
- Hegar-Baumgartner Vital Needle Holder

Common Name
- Regular or Medium Needle Holder

Features
- Smaller than Mayo-Hegar
- Tips - rounded, straight
- Jaws - diamond, serrated (2500 teeth 1/2 inch)

Uses
- Skin closure, frequently interchanged with Mayo-Hegar needle holder. Often used with needle suture sizes up to 4-0.

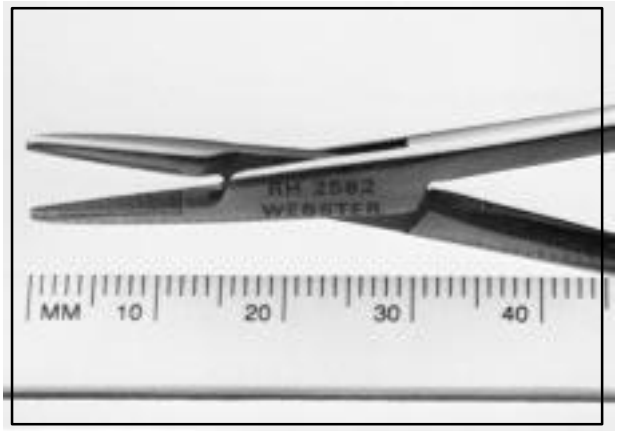


Proper Name
- Collier Needle Holder

Common Name
- Collier

Features
- Oval hole in centre of jaws
- Jaws - diamond serrated

Uses
- Medium gauge needles in general surgery.

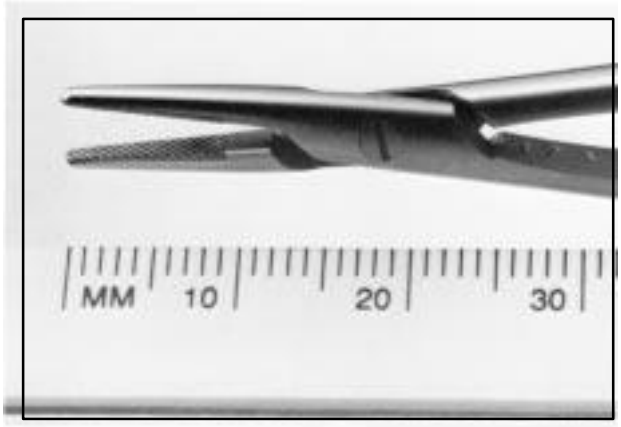


Proper Name
- Webster Vital Needle Holder

Common Name
- Webster

Features
- Jaws - narrow, semi-rounded - diamond serrated (3600 teeth 1/2 inch)

Uses
- ENT, plastic and pediatric surgery, holds needles with suture sizes 7-0 and 8-0.

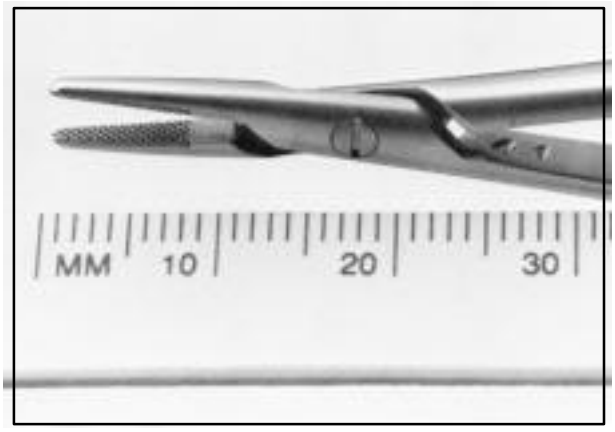


Proper Name
- Castroviejo Vital Needle Holder (7 Inches)

Common Name
- Cassies, Eyed Needle Holder

Features
- Spring handle instument
- Locking mechanism to secure needles
- Tips - small
- Jaw - straight or curved
  - diamond serrated (3600 teeth 1/2 inch)

Uses
- Cardiovascular, plastic, eye surgery or any other fine suturing procedure. Needles are generally with suture sizes 5-0 and 6-0.



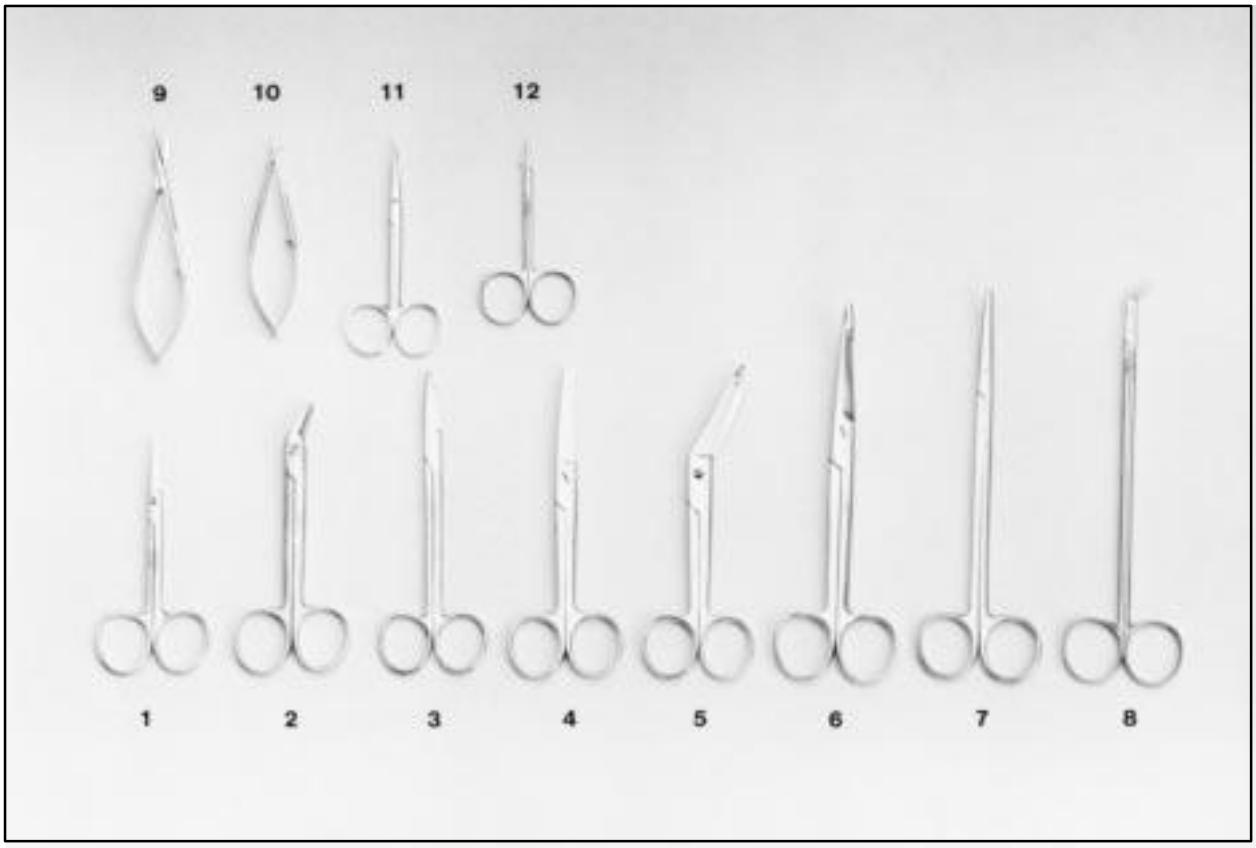
Proper Name
- Castroviejo Vital Needle Holder (8 1/2 inches)

Common Name
- Cassies

Features
- Same as castroviejo vital needle holder (7 inches)

Uses
- Because of longer length, used in deeper cavities than castroviejo vital needle holder 7 inches.

SCISSORS



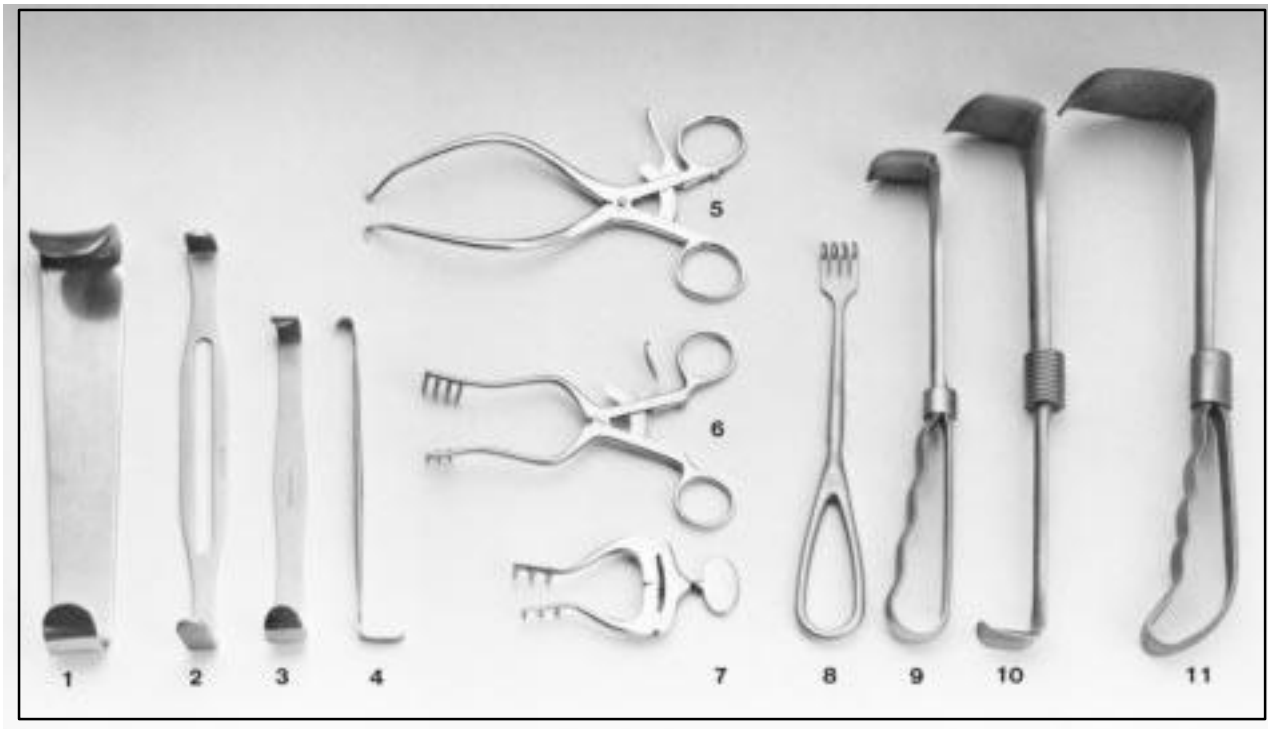
1. 4 1/2" Micro Straight 2. 4 3/4" Angled Wire Cutting 3. Littauer 4. Straight Operating
5. Lister Bandage 6. Mayo Dissecting 7. Metzenbaum 8. Potts-Smith 9. Westcott
10. Castroviejo 11. Stevens 12. Iris

- Surgical scissors are made in many patterns, lengths, weights, and shapes for cutting and dissecting, whether this be soft tissue or sutures.
- Generally speaking, curved scissors are used to cut and dissect tissue as opposed to straight scissors because the surgeon can point the tip toward the line of sight and better visualize what is being cut or dissected.
- Straight scissors are used more for cutting sutures or any tissue when a smooth, straight cut is desired such as a damaged nerve or blood vessel which is going to be sutured back together.
- Scissors are also used for probing or dissecting and spreading tissue by the opening action of the blades. There are basically three major types of scissors used for tissue dissection:
  A. Mayo scissors with curved or straight blades. These scissors are identified by a heavy blade with rounded tips.
  B. Metzenbaum (Metz) scissors with curved or straight blades. These scissors are similar to the Mayo except they are lighter in pattern and more delicate in nature.
  C. Iris (Dissecting) scissors with curved or straight blades and sharp tips. These scissors look somewhat like cuticle scissors and are very delicate in nature.
- Other prominent scissors used for cutting sutures, gauze and similar material are referred to as Operating or General Scissors.
- Scissors are available in various lengths, curved or straight, and with three different combinations of tips: 1. S/S Sharp-Sharp 2. S/B Sharp-Blunt 3. B/B Blunt-Blunt
- Heavier types of scissors are used for cutting fine wire sutures. This style of scissors has angular blades with serrated edges and have a groove for holding the wire as it is being cut.
- Some scissors have tungsten carbide cutting edges. These inserts provide a finer cutting edge with longer lasting wear. Tungsten carbide instruments can be identified by the gold plated ring handles.

GENERAL INSTRUMENTATION . . . CONT.

Proper Name	Common Name	Features	Uses
Micro Straight Scissor	Plastic Scissors, Iris Scissors	☐ Fine delicate ☐ Tip - sharp/sharp ☐ Straight or curved	☐ Plastic surgery, cutting suture, floor and emergency use.
4 3/4" Angled Wire Mesh Cutting Scissors	Wire Cutter	☐ One blade serrated ☐ Jaws - short, sturdy, angled	☐ Used to cut fine wire, wire and sutures.
Littauer Suture Scissors	Stitch Scissors	☐ Notch on tip of lower blade ☐ Tips - sharp, blunt tips	☐ Floor instrument used for removing skin sutures. Notch is placed under suture and then the suture is cut.
Straight Operating	Operating Scissors	☐ Point - sharp/blunt or	☐ Cutting sutures.
Lister Bandage Scissors	Bandage Scissors	☐ One blade - extended probe point ☐ One blade - round point ☐ Blades angled	☐ To cut or remove bandages and splints.
Mayo Dissecting Scissors	Mayos, Heavy Scissors Suture Scissors	☐ Blades - straight or curved ☐ Tip - blunt Scissors	☐ Smooth cutting and dissections without tearing of tissue and suture. The 5 1/2 inch size may be used to cut suture while the large sizes may be preferred for heavier tissue in deep cavities.
Metzenbaum Dissecting Scissors	Metz, Tissue Scissors	☐ Blades - thin fine - straight or curved ☐ Tips - blunt	☐ Cutting delicate tissue and blunt dissection.
Potts-Smith Scissors	Potts Scissors	☐ Variety of angles (45 most common) ☐ Tips - sharp/sharp	☐ Cardiovascular cases, especially coronary bypass. Also used in thoracic cases.
Westcott Tenotomy Scissors	Westcott	☐ Spring handled ☐ Cutter shank - horizontal serrations ☐ Blades - sharp/sharp - curved to right	☐ Often used by ophthalmic surgeons, as it causes less fatigue than ring-handle scissors.
Castroviejo Keratoplasty Scissors	Corneal Scissors	☐ Blades - small, angled ☐ Tips - sharp/sharp ☐ Spring handle ☐ Cutter shark - horizontal serrations	☐ Ophthalmic surgery, especially corneal procedures.
Stevens Tenotomy Scissors	Stevens, Tenotomy	☐ Tip - blunt/blunt ☐ Blades - straight or curved	☐ Ophthalmic and ENT surgery; dissecting tissue.
Iris Scissors	Iris, Small/Sharp Scissors	☐ Tips - sharp/sharp ☐ Blades - straight or curved	☐ Fine, delicate surgery and sharp dissection; used in eye, micro, ENT and plastic surgery.

RETRACTORS



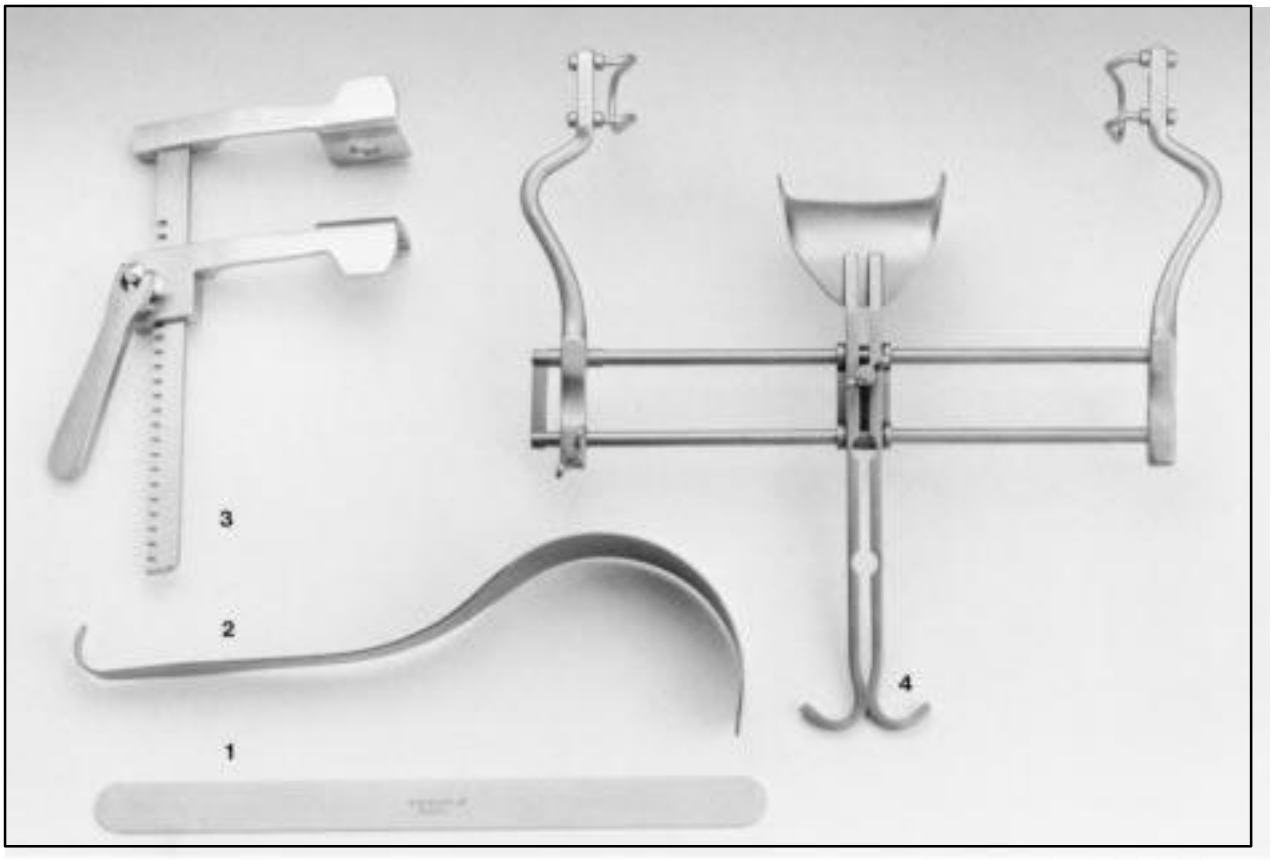
1. Roux 2. USA 3. Parker 4. Senn 5. Gelpi 6. Weitlaner 7. Jansen Mastoid 8. Volkmann
9. Richardson 10. Richardson-Eastman 11. Kelly

- This is a group of instruments used for holding the incision open to provide exposure of the surgical area.
- Retractors are available in various styles including pointed or blunt hook ends, wire loops or blades of various widths and depths.
- Small models held by the fingers or hand retract skin and subcutaneous tissue in shallow surgical areas.
- Larger models retract muscle tissue and organs in deeper surgical areas.
- Self-retaining retractors (ones which are held open by their own action) are used wherever possible to maintain the surgical opening and hand retractors are used with them to hold internal organs away from the operative field.

GENERAL INSTRUMENTATION . . . CONT.

Proper Name	Common Name	Features	Uses
Roux Retractor	Hernia Retractor	☐ Hand held ☐ "U" shaped bend (unequal) slightly flared	☐ Hernia operations; can also be used with other abdominal cases.
U.S.A. Retractor	Army-Navy Retractor, Army-Navy, U.S. Army	☐ Hand held ☐ Double ended 90º blades	☐ Tissue retraction in shallow incisions.
Parker Retractor	Parker	☐ Hand held ☐ "U" shaped bends (unequal)	☐ Retraction of tissue in shallow incisions.
Senn Retractor	Senn, Rake Retractor	☐ Hand held ☐ Two end - sharp three prong rake - slender 90º blade	☐ Retraction of skin and shallow tissue.
Gelpi Retractor	Gelpi	☐ Self retaining ☐ Sharp tenaculum style blades	☐ Used to retract tissues, such as muscle along the vertebral column in spinal surgery; also used in OB/GYN surgery.
Weitlaner Retractor	Weitlaners, Self Retaining Rake, Cerebellar	☐ Self retaining ☐ Blade - 3 semi sharp prong tips - 4 semi sharp prong tips	☐ Retaining of tissue in shallow areas; frequently used in spinal procedures, crainiotomies and orthopedic cases.
Jansen Mastoid Retractor	Shallow Blade Mastoid Retractor	☐ Self retaining ☐ Blades - 3 pronged tips	☐ Primarily used in neurosurgery to expose burr hole. Often used in ear cases, i.e post-auricular incisions.
Volkmann Retractor	Volkmann, Rake, Cat's Paw, Four Prong Retractor	☐ Hand held ☐ Curved prong tips ☐ Tips - sharp or blunt ☐ Handle - long, looped shape	☐ Retraction of tissue in shallow incisions.
Richardson Retractor	Little, Medium or Large Rich Retractor	☐ Hand held ☐ Blade 90º	☐ Retraction of tissue during incision.
Richardson-Eastman Retractor	Richardson Retractor	☐ Hand held ☐ Blades 90º (unequal) ☐ Hand grip (in center)	☐ Retraction of tissue in deep cavities.
Kelly Retractor	Kelly, Richardson	☐ Hand held ☐ Larger blades then Richardson ☐ Blade 90º angle	☐ Retraction of tissue in deep cavities.

RETRACTORS

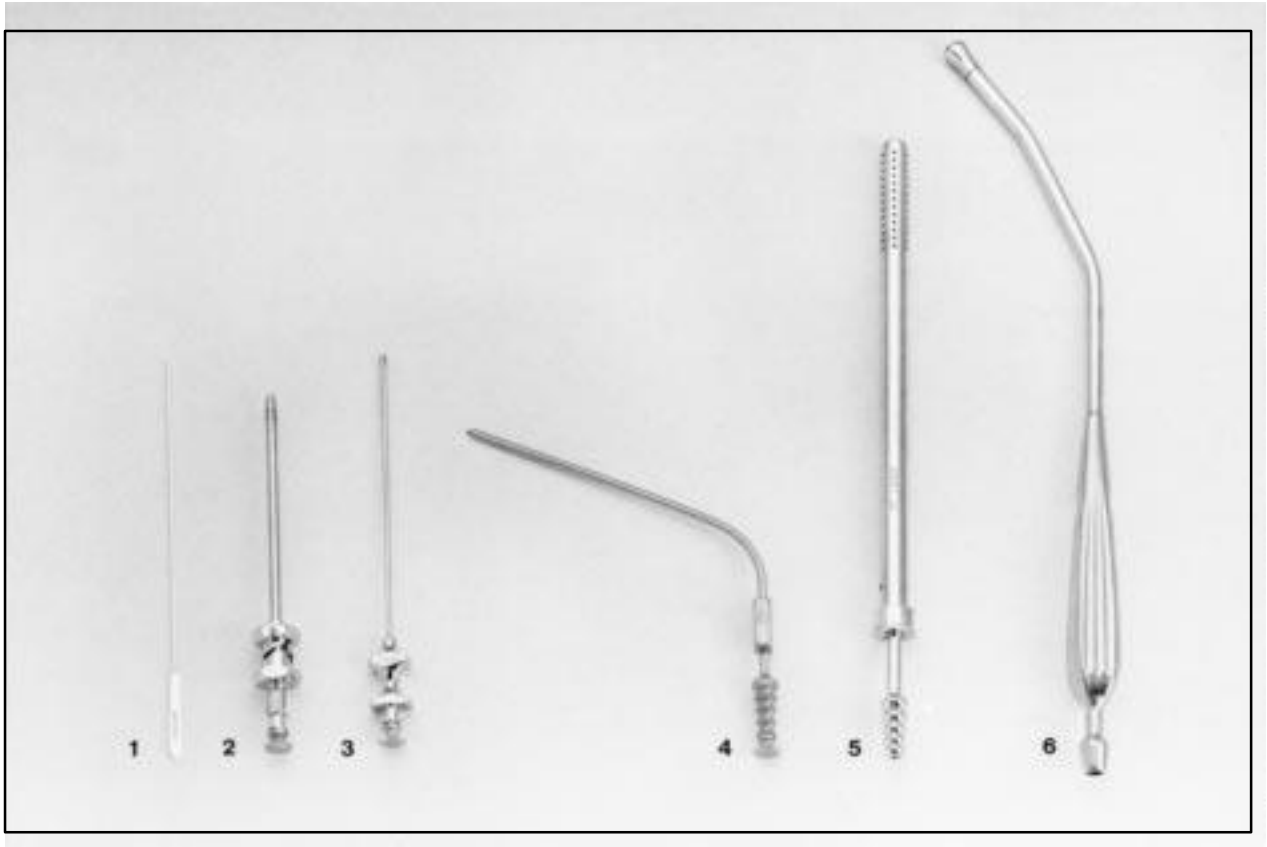


1. Ribbon 2. Deaver 3. Finochietto Rib Spreader 4. Mueller-Balfour

GENERAL INSTRUMENTATION . . . CONT.

Proper Name	Common Name	Features	Uses
Ribbon Retractor	Malleable Retractor	☐ Hand held ☐ Flat, straight ☐ Allow bending, shaping	☐ Special retraction of tissue where specific shape is required and not available in any standard retractor form.
Deaver Retractor	Deaver	☐ Hand held ☐ Circular, curved blades ☐ Handle curved oppositely to blade direction	☐ Deep cavity tissue retraction.
Finochietto Rib Spreader	Rib Spreaders, Rib Retractor, Finochietto	☐ Self retaining ☐ One blade stationary, other movable	☐ To retract ribs during thoracic procedures.
Mueller-Balfour Retractor	Balfour	☐ Self retaining	☐ To retract wound edges during abdominal procedures.

MISCELLANEOUS

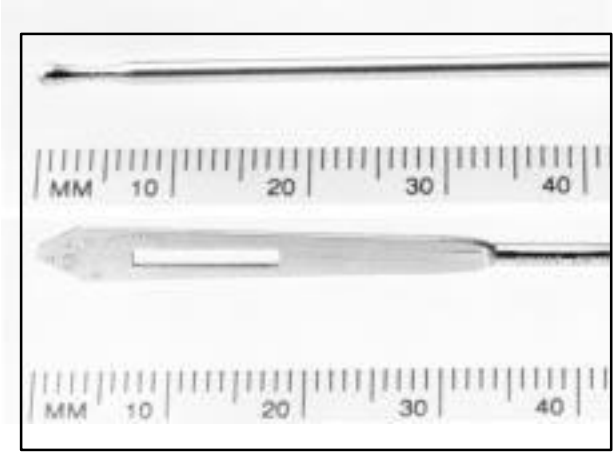


1. Probe with Eye 2. Abrams Pleural Biopsy Punch 3. Franklin-Silverman Biopsy Needle
4. Frazier Suction Tube 5. Pool Abdominal Suction Tube 6. Yankauer Suction Tube

Probes
- Probes are surgical instruments used to explore the depths as well as direction of bodily ducts, sinuses or cavities. Many surgical probes are long, slender and flexible to better conform to bodily contours with minimal trauma. Probes may also aid in dilating or irrigating an area of the body (i.e. a duct).

Biopsy Needles
- Biopsy Needles are surgical instruments used for the removal of bodily fluids or tissue. Biopsy needles must be sharp and clean to reduce tissue trauma that results when obtaining a specimen.

Suction Tubes
- Suction is the application of pressure to the operative site for the removal of blood and tissue fluids. Surgeons utilize suction to better identify anatomical structures during operative procedures. An appropriate style tube is attached to sterile conductive suction tubing. Tube size will depend on the type of surgical procedure (i.e. the more delicate the procedure, the smaller the tip). The suction tubing is also connected to a graduated reservoir to measure the amount of fluid removal.

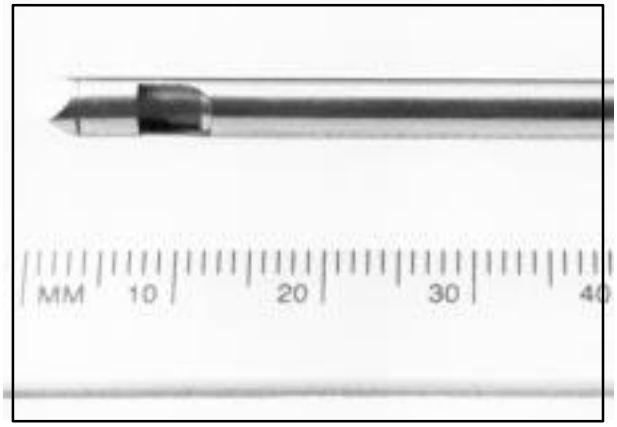


Proper Name
- Probe With Eye

Common Name
- Silver Probe

Features
- Narrow, hollow shaft
- Malleable, rounded dip
- Tip - maybe threaded with suture

Uses
- Probing a fistula; also used in hemorrhoid set.

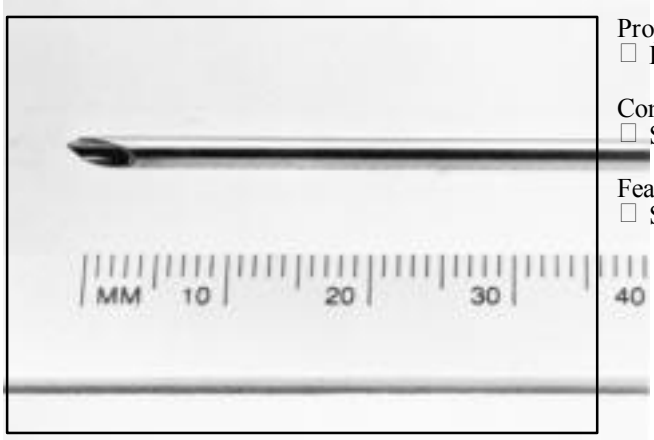


Proper Name
- Abrams Pleural Biopsy Punch

Common Name
- Abrams Punch

Features
- Straight, heavy shaft with trocar tip
- Allows to go between ribs tips

Uses
- Biopsy of lung tissue with suspected tumors or disease; provides larger specimen than biopsy needle.

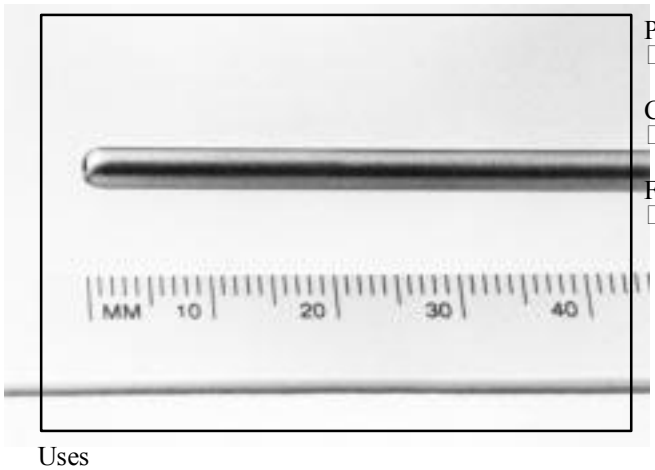


Proper Name
- Franklin-Silverman Biopsy Needle

Common Name
- Silverman Biopsy Needle

Features
- Straight, slender shaft with grooved distal tips

Uses
- Liver and kidney biopsy; also for obtaining specimens from prostate, thyroid and lymph glands.

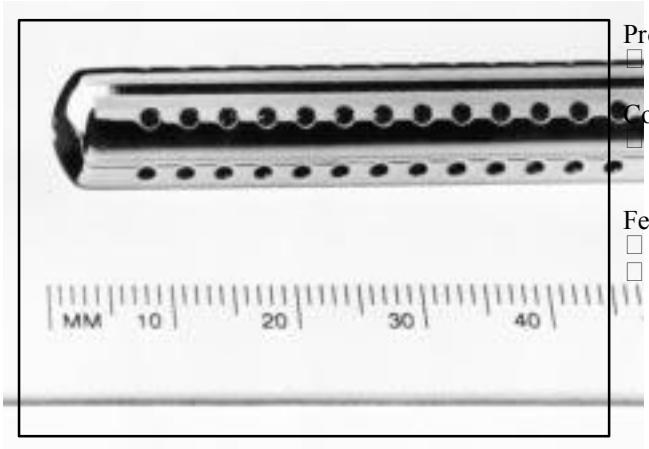


Proper Name
- Frazier Suction Tube

Common Name
- Small Suction Tip, Neuro Suction, Nasal Suction

Features
- Tubular shape shaft with 45 degree bend

Uses
- Removal of fluids from superficial wounds; often used in neuro and ENT procedures.



Proper Name
- Pool Abdominal Suction Tube

Common Name
- Pool Suction Tube

Features
- Straight, tubular with hole
- A sleeve with multiple holes around tube

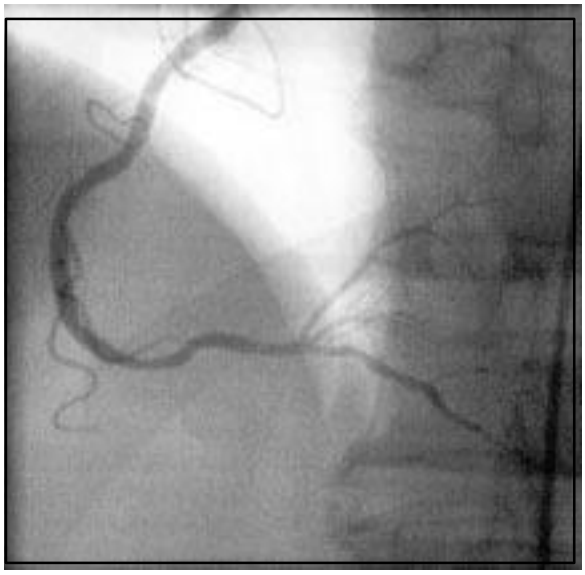
Uses
- To remove fluids from the abdominal cavity where omentum may have a tendency to wrap around a suction tip with only one hole. This suction device will continue to function even when some holes become clogged with tissue. Also used quite often in OB/GYN surgery.

Proper Name
- Yankauer Suction Tube

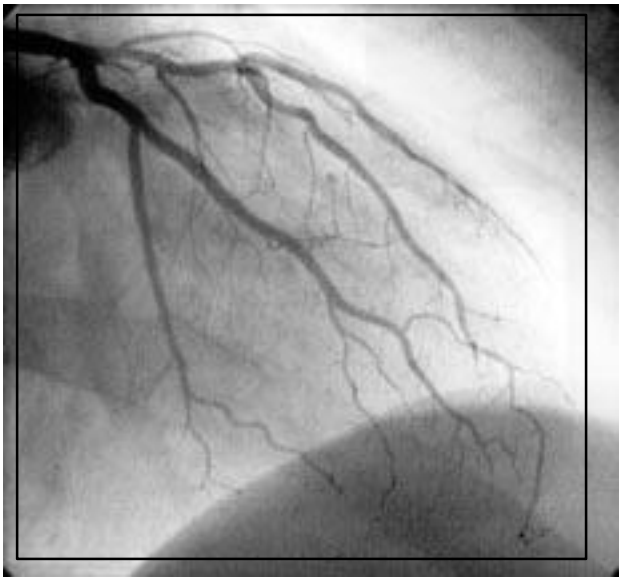
Common Name
- Plain Suction Tip, Tonsillar Suction Tip, Tonsil Tip, Driver

Features
- Curved shaft with slight curve near tip
- Tip with removable cap

Uses
- Removal of fluids from a variety of surgical incisions.



C1. Normal right coronary artery (RCA) with posterior interventricular (PIV) artery running inferiorly, and the posterior lateral branches branching superiorly in this view.
(Courtesy Toronto General Hospital Catheterization Laboratory)



C2. Normal left coronary artery (LCA) with the circumflex system inferior to the left anterior descending (LAD) artery in this view.
(Courtesy Toronto General Hospital Catheterization Laboratory)

C3. LAD with 95% stenotic lesion distal to diagonal branches.
(Courtesy Toronto General Hospital Catheterization Laboratory)

D1. Stasis Dermatitis
Erythematous scaling patches on lower legs. May see hyperpigmentation, swelling, and ulceration.
(Courtesy Dr. L. From)

D2. Contact Dermatitis
Sharply demarcated, weeping and crusting papules and vesicles.

D3. Atopic Dermatitis
Excoriated, lichenified plaques with erythema, dryness, and crusting.

D4. Seborrheic Dermatitis
Diffuse within scalp margin, greasy yellow-white scales and underlying erythema.

D5. Acne Vulgaris
Inflammatory papules, pustules, and open comedones.

D6. Acne Rosacea
Prominent facial erythema, telangiectasia, rhinophyma, and scattered papules.
(Courtesy Dr. L. From)

D7. Psoriasis
Dry, well-circumscribed, silvery scaling papules and plaques. *(Courtesy Dr. L. From)*

Well-demarcated, waxy, brownish-black or tan papules/plaques; warty and "stuck-on" appearance.

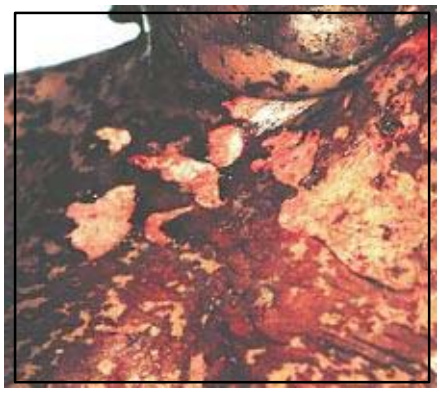
D9. Onychomycosis
Distal onycholysis, nail pitting, and subungual hyperkeratosis.

D10. Tinea Capitis
Diffuse area of mild scaling and hair loss with follicles present and occasionally erythema and pyoderma.

D11. Epidermal Cyst
Round, firm, yellow/flesh coloured, mobile nodule; may observe a follicular punctum on the overlying epidermal surface.

D12. Alopecia Areata
Sharply demarcated circular patch of scalp completely devoid of hair.

D13. Vitiligo
Typical acral distribution showing cutaneous depigmentation due to an acquired loss of melanocytes.

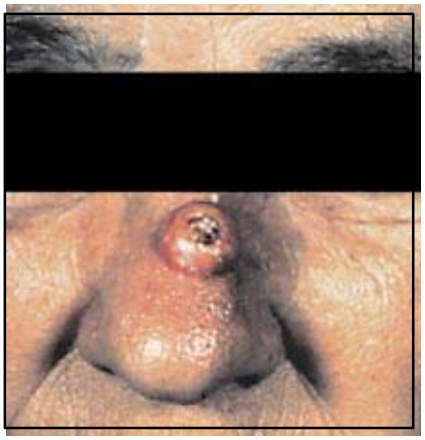


D14. Toxic Epidermal Necrolysis (TEN)
Widespread necrosis with painful blistering and denuding of epidermis.

D15. Erythema Nodosum
Tender, poorly demarcated, deep-seated nodules and plaques usually on lower extremities. *(Courtesy Dr. M. Mian)*

D16. Erythema Multiforme (EM)
Macules/papules with central concentric rings. *(Courtesy of Women's College Hospital Slide Library, Toronto)*

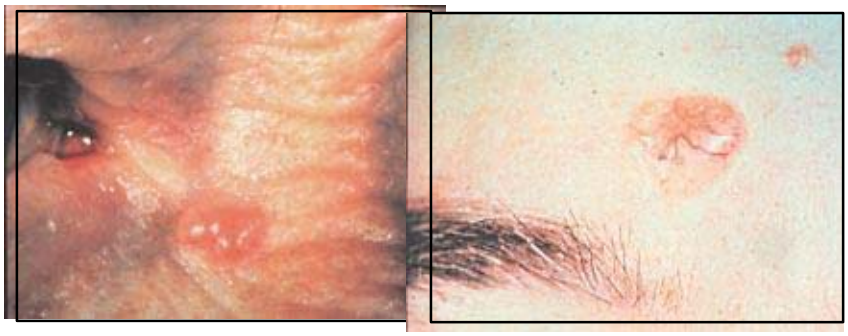
D17. Squamous Cell Carcinoma (SCC)
Indurated erythematous nodule or plaque with hyperkeratotic surface scale/crust and ulceration.



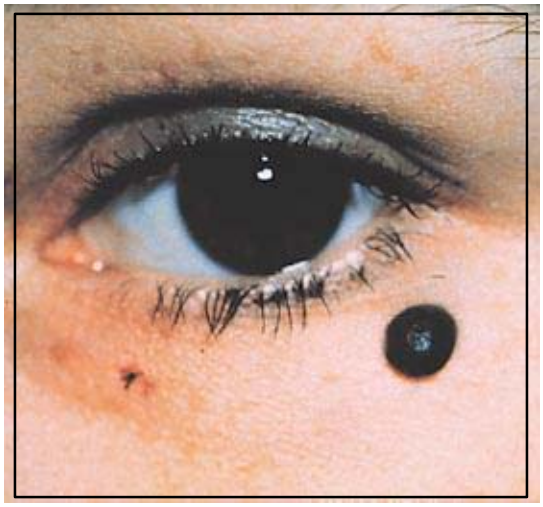
D18. Keratoacanthoma
Benign squamous exophytic nodule with central keratin-filled crater.

D19. Actinic Keratosis
Hyperkeratotic, erythematous, slightly elevated, flat-surfaced papules and patches on sun-exposed skin. *(Courtesy Dr. C. Forrest)*

D20. Kaposi's Sarcoma
Bluish-red cutaneous nodules on the lower extremity. *(Courtesy Dr. J. Murray)*

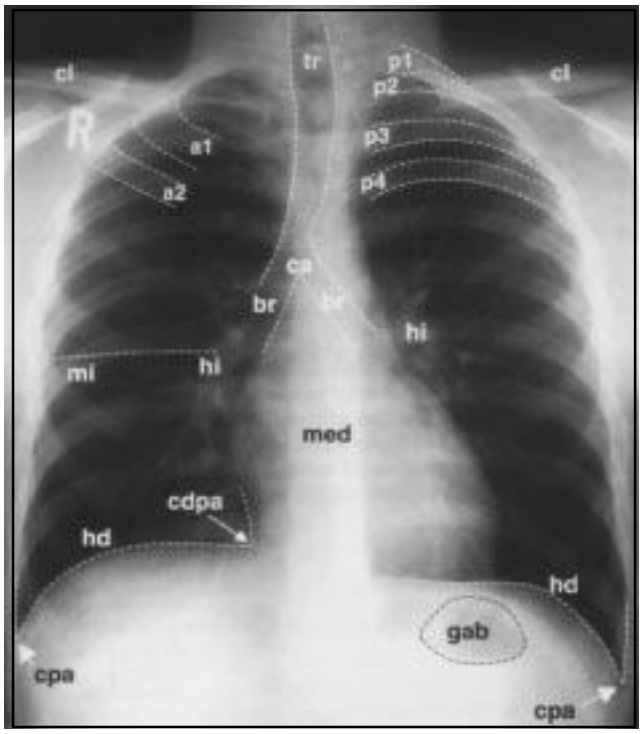


D21. Basal Cell Carcinoma (BCC)
Skin-coloured papule or plaque with rolled, translucent/pearly, telangiectatic outer border.

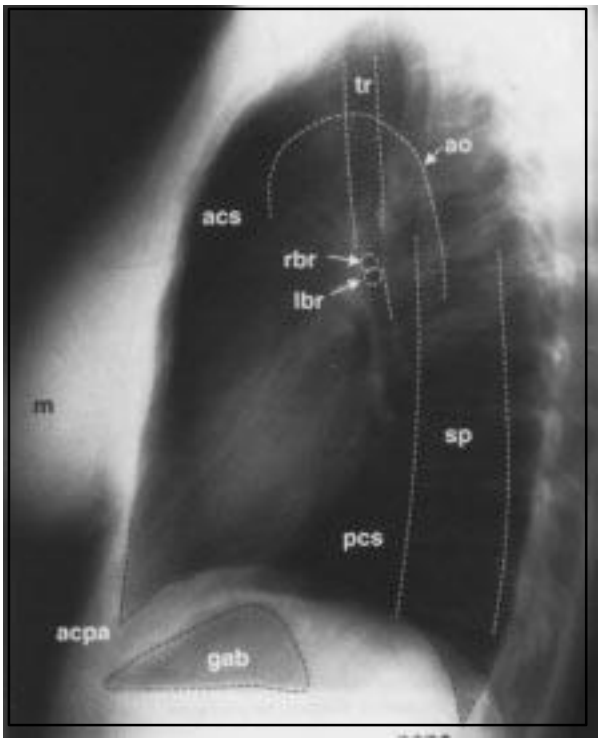


D22. Benign Compound Nevus
Proliferation of nevomelanocytes characterized by hyperpigmented macules or papules of regular shape and uniform colour.

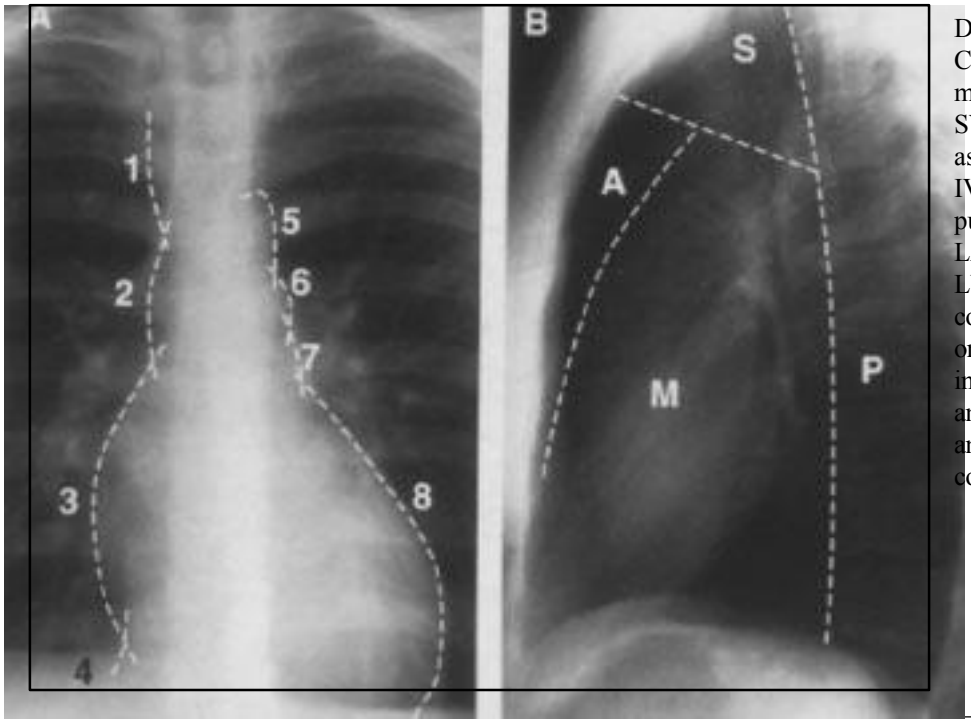
D23. Malignant Melanoma
Superficial spreading lesion characterized by asymmetrical irregular border, variegated colour, and diameter greater than 0.6 mm.



DM1. PA Film
Normal PA film of a male. Note the right and left clavicles (cl), posterior (p1-4) and anterior (a1-2) ribs, right and left costophrenic angles (cpa), right cardiophrenic angle (cdpa), right and left hemidiaphragms (hd), gastric air bubble (gab), trachea (tr), right and left mainstem bronchi (br), mediastinal shadow (med), carina (ca) and, right and left hila (hi). The normal position of the minor fissure (mi) is also indicated.

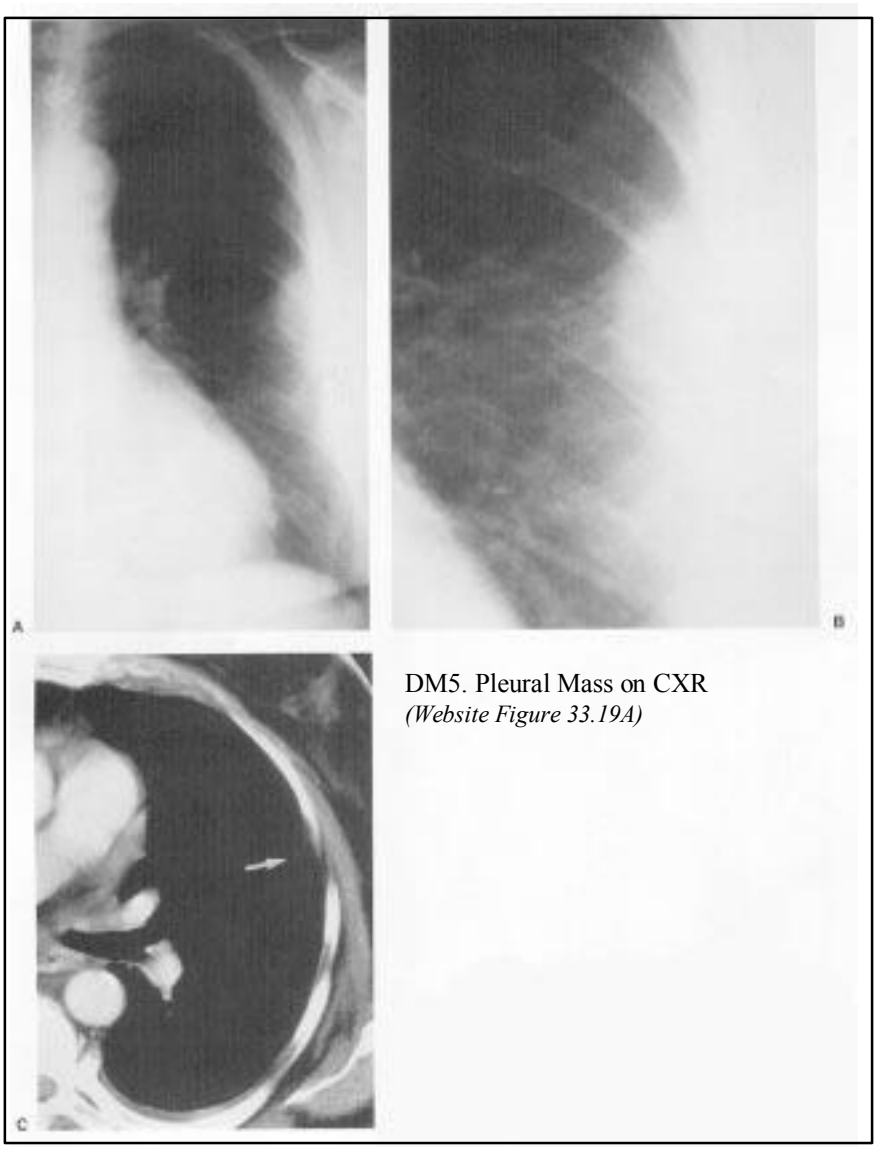


DM2. Lateral Film
This is a normal lateral film of a female patient. Note the spine (sp), anterior costophrenic angle (acpa), gastric air bubble (gab), trachea (tr), left mainstem bronchus (lbr), right mainstem bronchus (rbr), aortic arch (ao), anterior/retrosternal (acs) and posterior/ retrocardiac (pcs) clear spaces and, breast shadow (m).

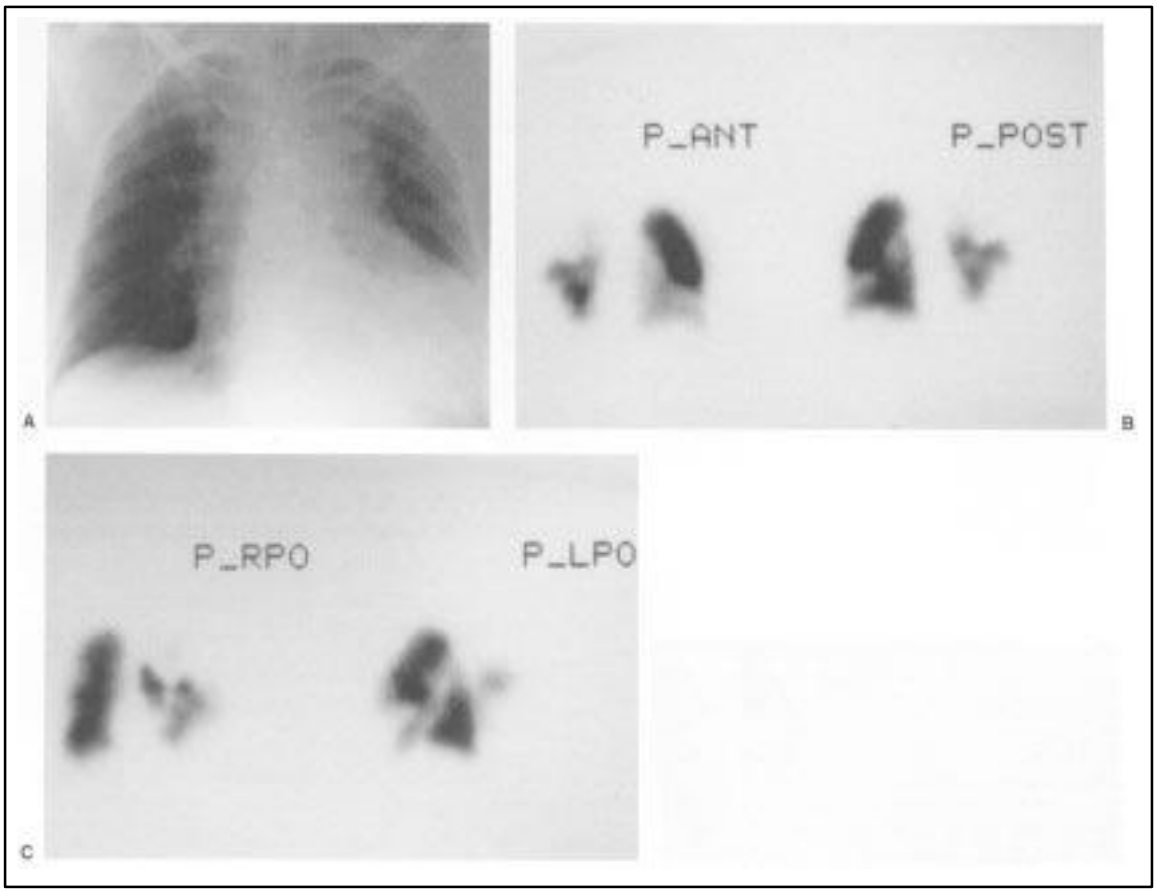


DM3. Mediastinum
Components of the PA mediastinal shadow (A): SVC (1), ascending aorta (2), RA (3), IVC (4), aortic arch (5), pulmonary trunk (6), LA appendage (7) and, LV (8). Mediastinal compartments on the lateral film (B) include: superior (S), anterior (A), middle (M) and posterior (P) compartments.

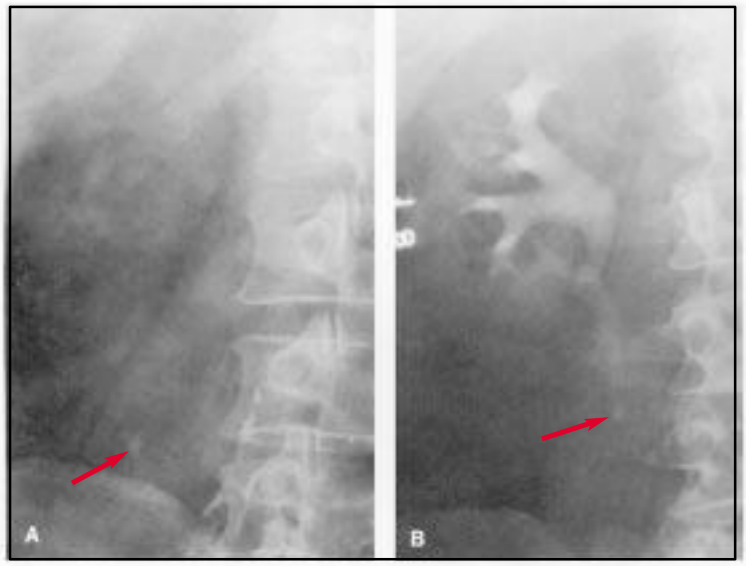
DM4. Pleural Effusion on CXR
(Courtesy Clinical Radiology - the Essentials, 2nd ed. Richard H. Daffner, 1999, Lippincott Williams and Wilkens)



DM5. Pleural Mass on CXR
(Website Figure 33.19A)



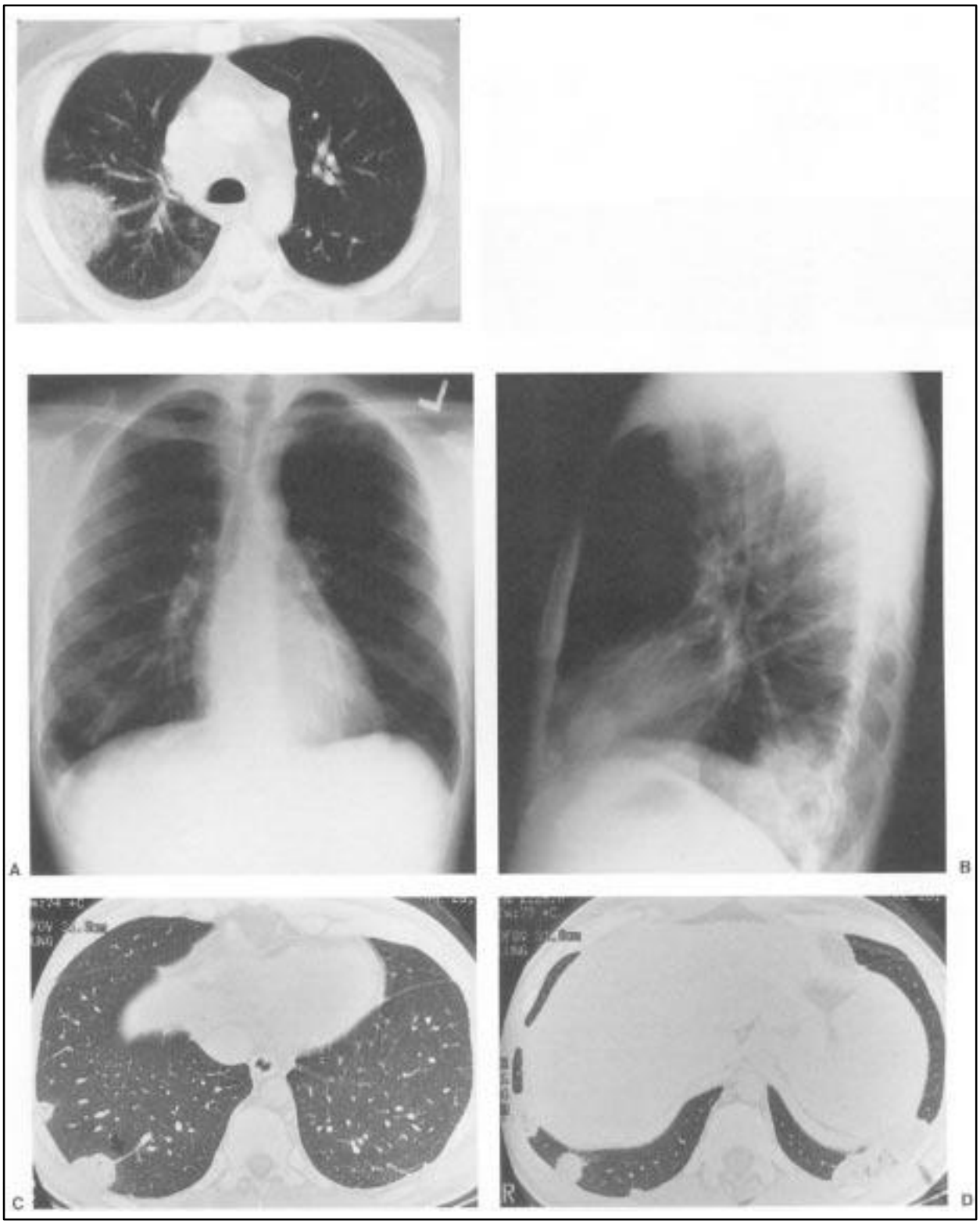
DM6. Pulmonary Embolism (PE)
This 59-year-old woman presented with acute shortness of breath, respiratory failure, and hypoxemia.
A: The chest radiograph showed a new area of consolidation in the left lower lobe and a left pleural effusion, findings suspicious but not specific for pulmonary embolus with infarction.
B and C: Perfusion scan shows multiple segmental perfusion defects. Ventilation scan (not shown) was normal. Ventilation-perfusion (V/Q) findings indicate a high probability for pulmonary emboli.
(Courtesy Clinical Radiology made ridiculously simple)



DM7. Ureteral Calculus
Right ureteral calculus.
A: Note the density (arrow) just above the right iliac crest in this right posterior oblique projection.
B: Urogram shows slight dilatation of the ureter extending down to the site of the calculus. This roentgenogram was obtained at 90 minutes after IV injection of contrast material. Earlier films showed no excretion on the right side, demonstrating that delayed films were essential to confirm the diagnosis of ureteral calculus in this patient.
(Courtesy Clinical Radiology - the Essentials, 2nd ed. Richard H. Daffner, 1999, Lippincott Williams and Wilkens)

DM8. Septal (Kerley) Lines
Thickened connective tissue planes most commonly occurring in pulmonary edema and lymphangitis carcinomatosis.
(Website Figure 28.1)

DM9. Ischemic Infarction
Ischemic infarction on CT head w/o enhancement (showing reduced density, edema/mass effect)
(Website Figure 11.59)



DM10. Pulmonary Embolus (PE) (Hampton's hump)
Hampton's hump refers to a pleural-based wedge representing lung infarct with pleural effusion.
(Website Figure 28.14)

E1. Cushing's Syndrome
Note moon face, plethora, truncal obesity, and thinning of extremeties.
(Courtesy Dr. W. Singer)

E2. Grave's Disease
Proptosis and lid lag.
(Courtesy Dr. W. Singer)

E3. Pretibial Myxedema
Waxy infiltrative plaques and edema, consistent with infiltrative dermopathy of Grave's disease.
(Courtesy Dr. W. Singer)

E4. Acromegaly
Broad nose, thick skin, deep skin creases, skin tags, and general coarse features.
(Courtesy Dr. W. Singer)

E5. Necrobiosis Lipoidica
Erythematous papules or nodules forming shiny/waxy, yellow-red plaques covered with telangectatic vessels with scaly, atrophic, and depressed centre.
(Courtesy The Hospital for Sick Children Slide Library, Toronto)

G1. Small Bowel Obstruction
Gas in distended loops of small bowel (note plicae circularae), ladder pattern, air-fluid levels, and colon devoid of gas.

G2. Bowel Perforation
Upright chest film showing subdiaphragmatic free air above the liver. *(Courtesy Dr. G. Olscamp)*

G3. Diverticular Disease
Mucosal and submucosal herniations though muscular layer of bowel.
(Courtesy Dr. G. Olscamp)

G4. Crohn's Disease
Terminal ileitis and narrowing of the lumen due to mucosal ulceration, extensive thickening and rigidity of the bowel wall.

G5. Ulcerative Colitis
Colon appears like a smooth tube due to loss of haustrations; ileocecal valve widely patent with involvement of terminal ileum.

G6. Colon Carcinoma
Classic "apple core" malignant lesion in transverse colon.
(Courtesy Dr. G. Olscamp)

G7. Pancreatitis
Mottled calcification in left upper quadrant suggestive of chronic pancreatitis. Note right-sided pleural effusion.

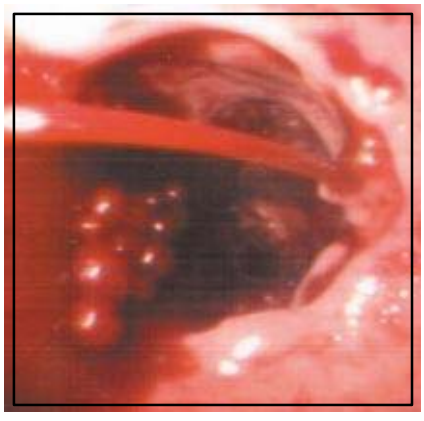
G8. Stone in the Common Bile Duct (CBD)
Stone in the CBD just at the take-off of cystic duct. *(Courtesy Dr. G. Haber)*

ENDOSCOPY

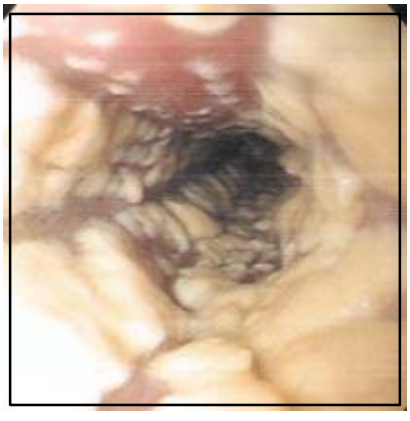
G9. Esophageal Varices
(Courtesy Dr. G. Kandel)

G10. Peptic Ulcer Disease
(Courtesy Dr. G. Kandel)

G11. Colon Carcinoma
(Courtesy Dr. G. Kandel)

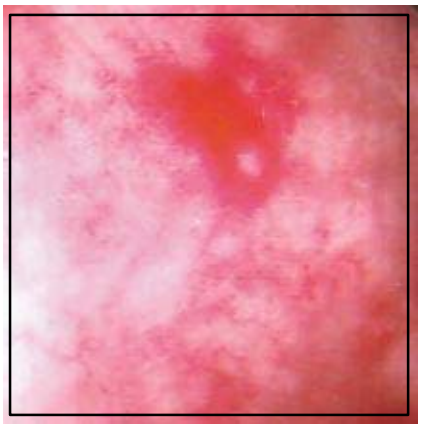


G12. Blood spurting from a small ulcer.
(Courtesy Dr. G. Kandel)

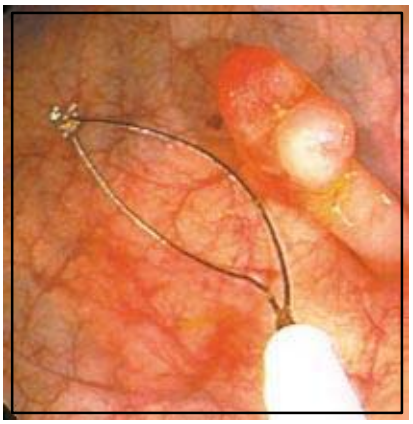


G13. Candida Esophagitis
(Courtesy Dr. G. Kandel)

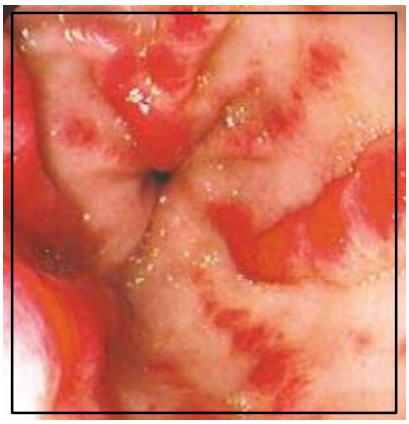
G14. Ulcerative Colitis
Diffuse, erythema, friability and loss of normal vascular pattern.
(Courtesy Dr. G. Kandel)



G15. Apthous Ulcer
Apthous ulcer of Crohn's disease. Note: normal surrounding mucosa.
(Courtesy Dr. G. Kandel)



G16. Colonic Polyp
Removal with snare.
(Courtesy Dr. G. Kandel)

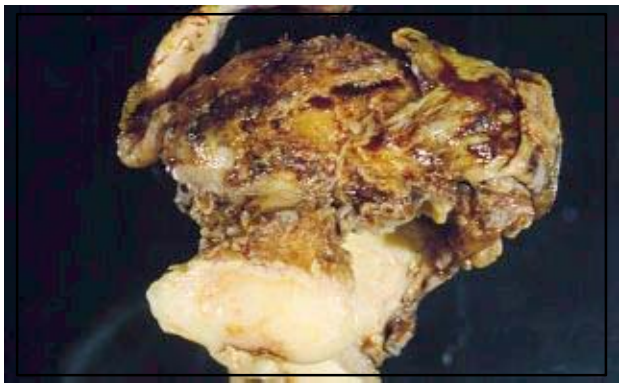


G17. Angiodysplasia ("Watermelon stomach") usually presents as anemia, can be treated by endoscopic coagulation.
(Courtesy Dr. G. Kandel)

G18. Internal Hemorrhoid
As viewed by retroflexing the colonscope.
(Courtesy Dr. G. Kandel)

G19. Pseudomembranous Colitis
(Courtesy Dr. G. Kandel)

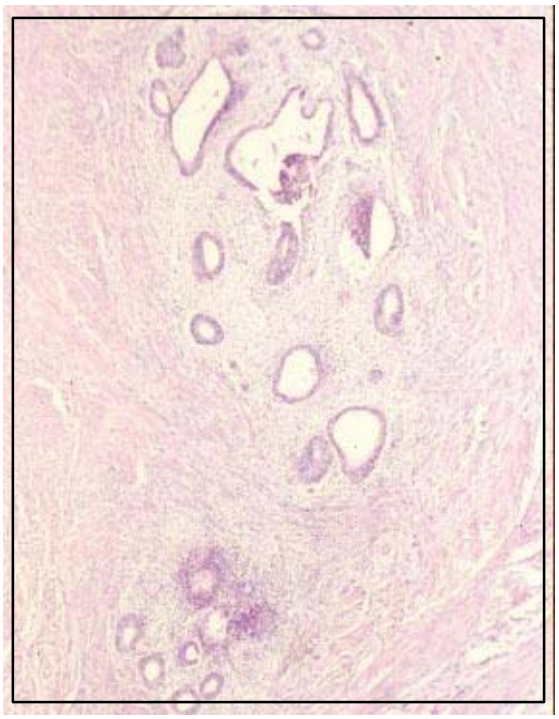
G20. Barrett's Esophagus
Short segment Barrett's esophagus - columnar epithelium extends up into the normal squamous epithelium of the esophagus in one quadrant.
(Courtesy Dr. G. Kandel)



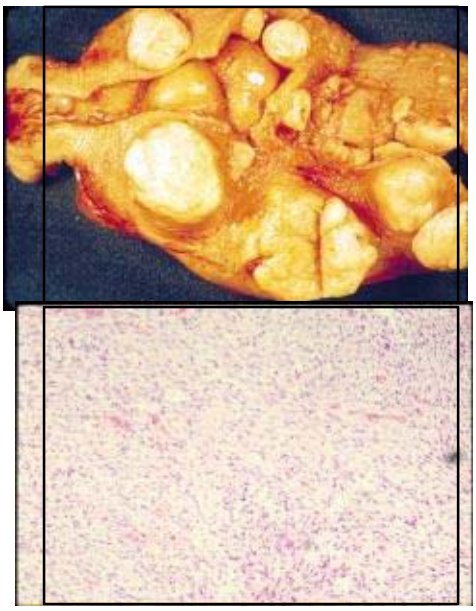
GY1. Endometriosis
Uterus with hemorrhagic fibrovascular adhesions on its serosal surface. (*Courtesy Dr. I. Zbeiranowski)*

GY2. Endometriosis Laporoscopic view
Brownish-black implant on the uterosacral ligament.
(Courtesy Dr. R. Pittini)

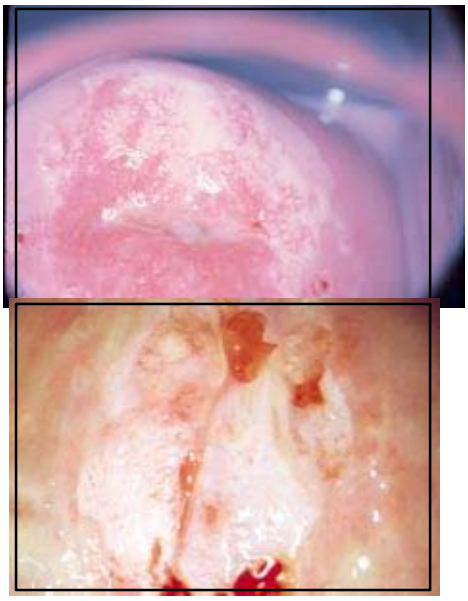
GY3. Ovarian Teratoma
Gross appearance of an ovary with a mature cystic teratoma.
(*Courtesy Dr. I. Zbeiranowski)*



GY4. Adenomyosis
Microscopic endometrial stroma and glands present deep within myometrium.
(*Courtesy Dr. I. Zbeiranowski)*



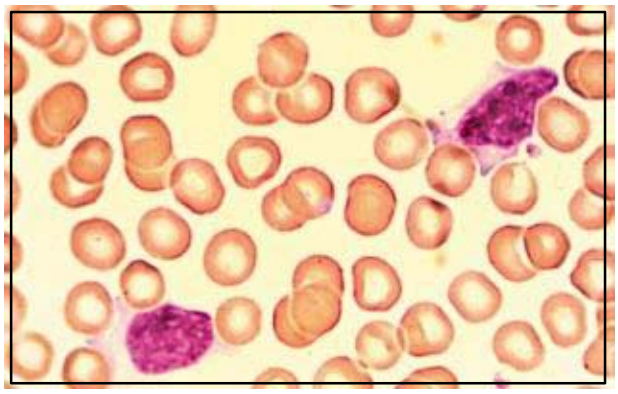
GY5. Leiomyoma
Top: Uterus with multiple leiomyomas.
Bottom: Microscopic view showing proliferative smooth muscle cells.
(*Courtesy Dr. I. Zbeiranowski)*



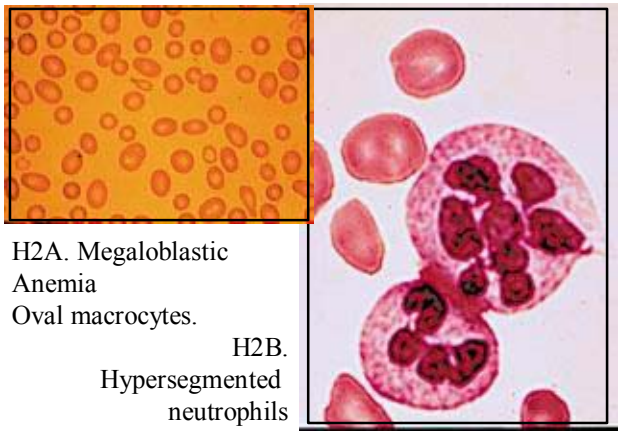
GY6. Cervical Lesion
Top: Low-grade squamous intra-epithelial lesion stained with acetic acid.
Bottom: Invasive cervical cancer.
(Courtesy Dr. G. Likrish)

GY7. Condyloma Acuminata ("genital warts") View of the cervix. Range from pinhead papules to soft cauliflower-like, skin coloured masses in clusters; associated with human papilloma virus.
(Courtesy Dr. W. Chapman)

GY8. Ectropion
Eversion of cervical canal, with columnar epithelium farther outside the external os of the cervix.
(Courtesy Dr. G. Likrish)

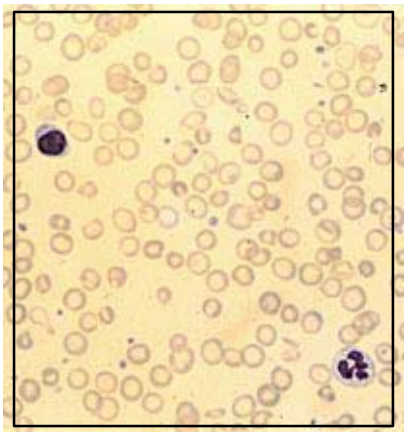


H1. Infectious Mononucleosis
Reactive large, cytoplasmic lymphocytes. Note indented cytoplasm and eccentrically placed nucleus.

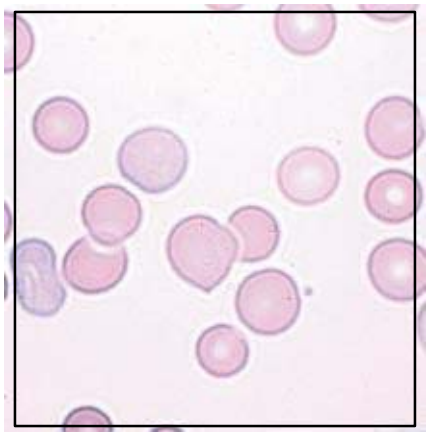


H2A. Megaloblastic Anemia
Oval macrocytes.

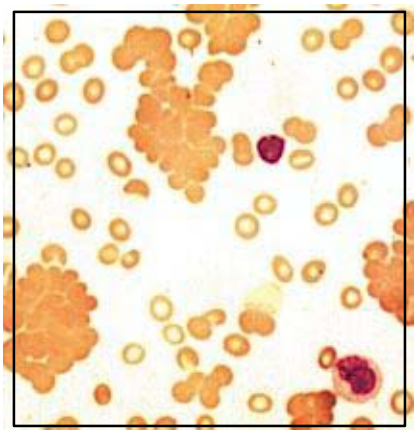
H2B. Hypersegmented neutrophils



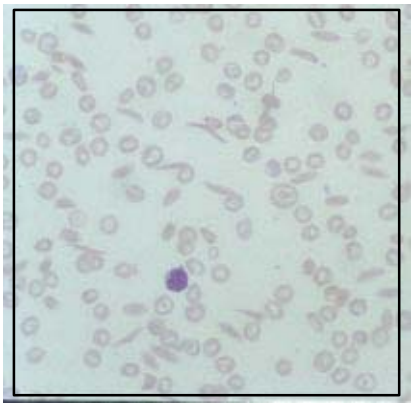
H3. Iron Deficiency Anemia
Microcytosis and hypochromia of red blood cells. Note increased area of central pallor.



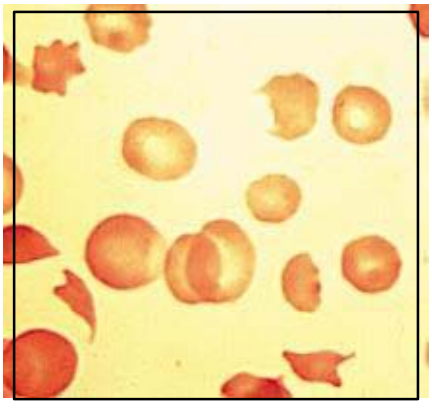
H4. Hemolytic Anemia
Macrocytes and microspherocytes with polychromasia (purplish tinge).



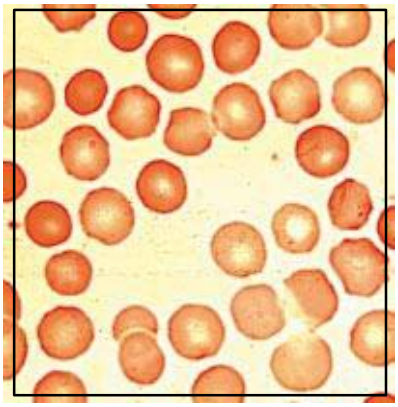
H5. Autoimmune Hemolytic Anemia
Agglutination of red blood cells.



H6. Sickle Cell Anemia
Elongated, crescent-shaped and sickle red blood cells. Also note target cells and Howell-Jolly body (both due to autosplenectomy secondary to repeated splenic infarcts). *(Courtesy Dr. M. Reis)*

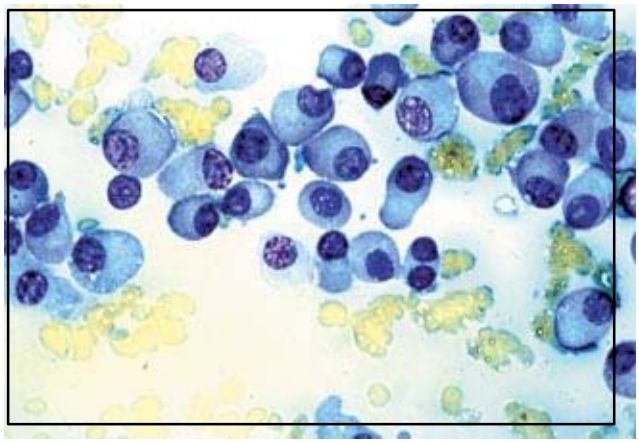


H7. Microangiopathic Hemolytic Anemia
Fragmented red blood cells (schistocytes).
Note helmet cell and triangle-shaped cell in bottom right field.

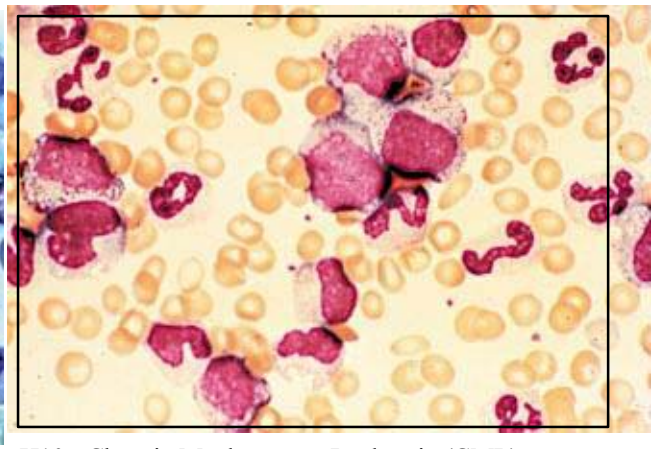


H8. Hereditary Spherocytosis
Small, round, densely staining red blood cells with no central area of pallor.

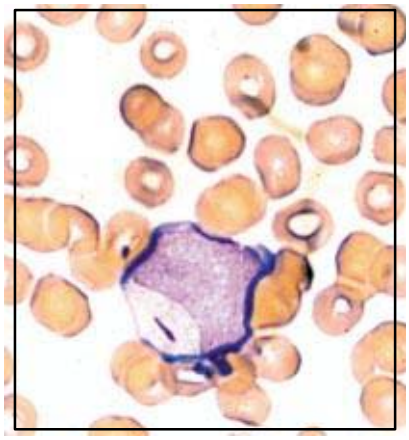
HEMATOLOGIC MALIGNANCIES



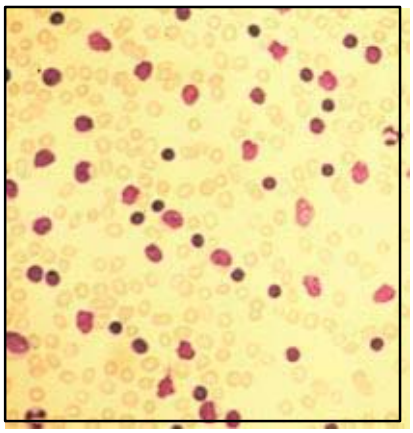
H9. Multiple Myeloma (Bone Marrow)
Plasma cells in marrow. Note binucleate malignant plasma cell in center field.



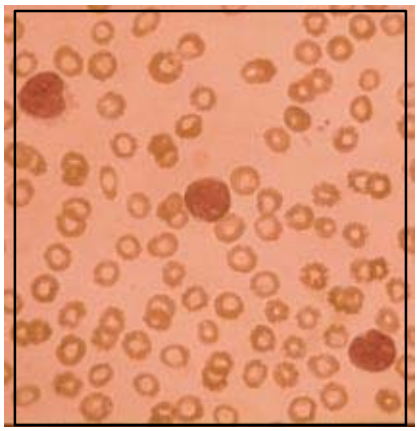
H10. Chronic Myelogenous Leukemia (CML)
Increased numbers of granulocytes and their precursors. Note most WBCs are band forms or segmented granulocytes.



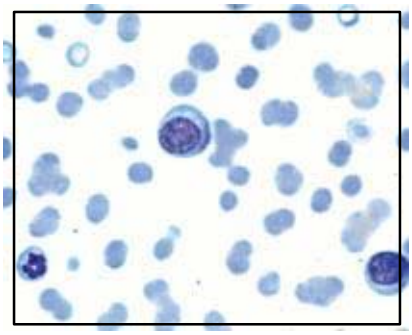
H11. Acute Myelogenous Leukemia (AML)
Note blast cell with Auer rod.



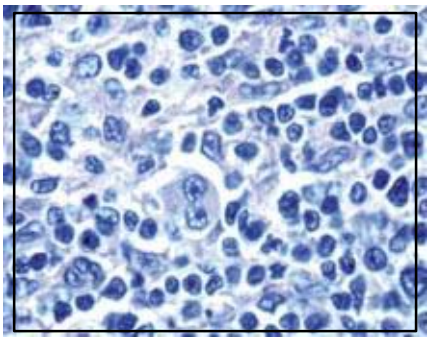
H12. Chronic Lymphocytic Leukemia (CLL)
Increased number of small, well-differentiated lymphocytes.
Note "smudge cells."



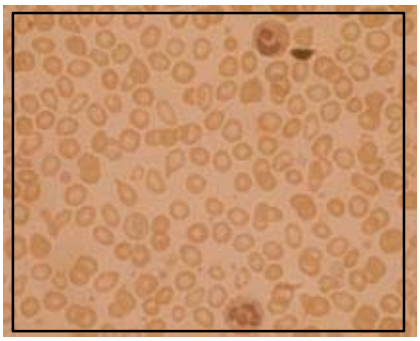
H13. Acute Lymphoblastic Leukemia (ALL). Round or convoluted nuclei, absence of cytoplasmic granules, and high nuclear to cytoplasmic ratio.
(*Courtesy Dr. D. Sutton)*



H14. Plasma Cell Myeloma
Note "rouleaux."



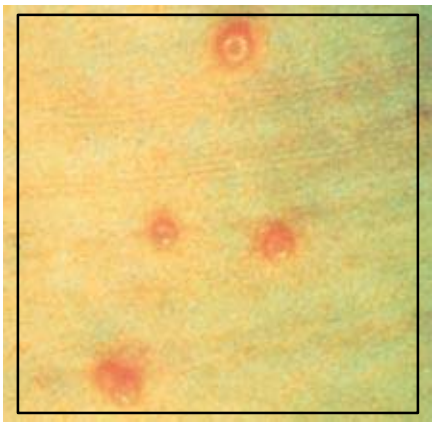
H15. Hodgkin's Lymphoma (Lymph Node). Reed-Sternberg cell is large and bilobed or binucleate. Prominent within the mirror-image nuclei are giant inclusion-like nucleoli ("owl's eyes").



H16. Myelofibrosis
Tear drop red blood cells (poikilocytes) in the center field.
(Courtesy Dr. D. Sutton)

ID1. Meningococcemia
Hemorrhagic papules or petechia with purpuric centres in acral distribution.
(Courtesy The Hospital for Sick Children Slide Library, Toronto)

ID2. Scabies
Small crusted papules, eczematous plaques, intense pruritus and excoriations, and superficial linear burrows.

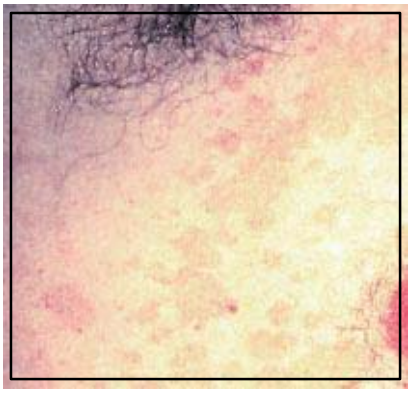


ID3. Molluscum Contagiosum
Discrete, umbilicated pearly white papules.

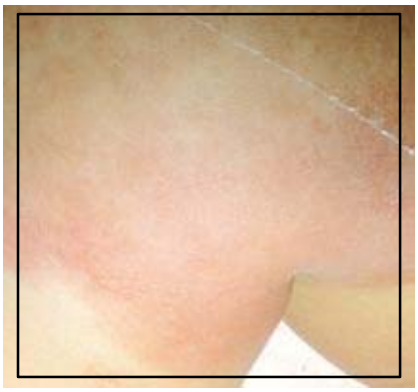
ID4. Verruca Vulgaris ("common warts")
Multiple hyperkeratotic, elevated, discrete epithelial growths with papillated surface.

ID5. Impetigo
Honey-coloured, "stuck-on" crusts, and erythematous weeping erosions.

ID6. Pityriasis Rosea
Multiple round to oval erythematous patches with fine central scale. *(Courtesy Dr. L. From)*



ID7. Pityriasis Versicolor
Brownish-white scaling macules on trunk.



ID8. Erysipelas
Streptococcal infection of the superficial dermis consisting of sharply delineated edematous plaques with raised margins. *(Courtesy Dr. M. Mian)*

ID9. Herpes Zoster
Hemorrhagic vesicles and pustules on an erythematous base limited to a dermatome. *(Courtesy Dr. L. From)*

ID10. Candidiasis
Macerated or eroded erythematous patches; often studded with papules, pustules, and "satellite" lesions.

ID11. Primary Syphilis
Single, erythematous, painless round chancre on penis.

012. Herpes
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rangement) on an
ythematous base
skin.

ID13. Secondary Syphilis
Commonly affecting palms and soles with oval, flat-topped, scaling, non-pruritic, red-brown papules.

ID14. Tinea Corporis
Pruritic, scaly, round/oval plaque with central clearing on the clavicle. *(Courtesy Dr. L. From)*

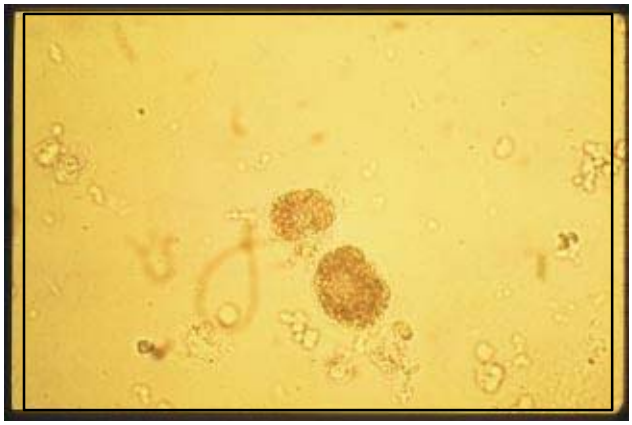
NP1. RBC Cast
Glomerular bleeding.

NP2. RBC Cast
Glomerular bleeding.

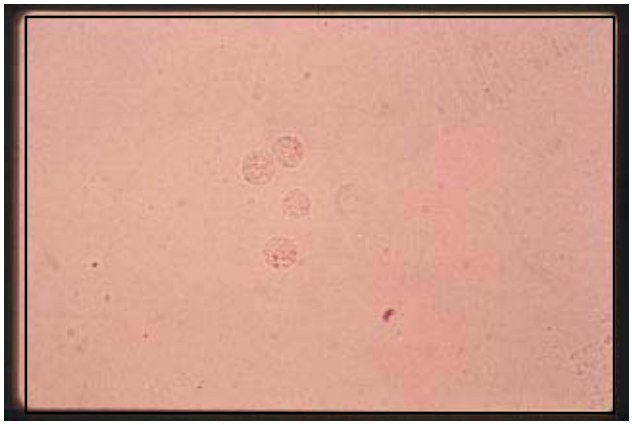
NP3. Heme-Granular Cast
Acute tubular necrosis or proliferative glomerulonephrities.

NP4. Hyaline Cast

NP5. Hyaline Cast



NP6. Oval Fat Bodies
Nephrotic syndrome.



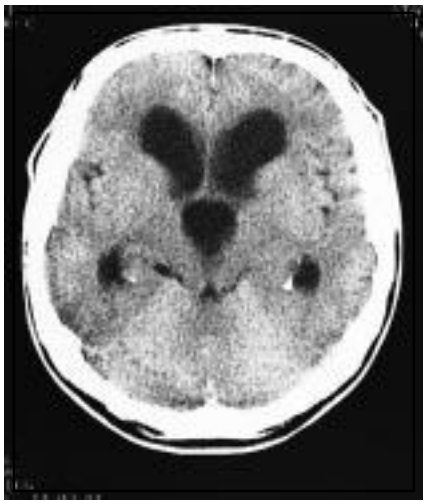
NP7. WBCs

NP8. WBC Cast
Pyelonephritis or interstitial nephritis.

NP9. WBC and Granular Cast
Pyelonephritis or interstitial nephritis.

NP10. ATN: Hemegranular Casts and Debris
Acute tubular necrosis (ATN).

NP11. Broad Granular Cast



NS1. Hydrocephalus
Ventricular enlargement, periventricular lucency, narrow or absent sulci +/– fourth ventricular enlargement.

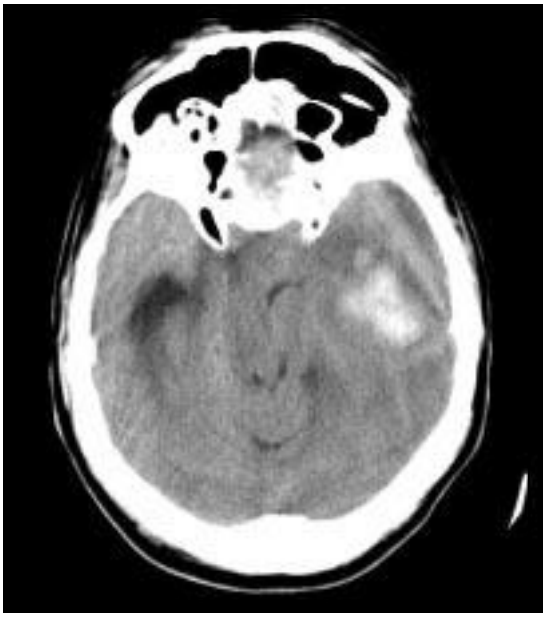
NS2. Epidural Hemorrhage
Right high density biconvex mass, usually uniform density and sharp margins.

NS3. Subarachnoid Hemorrhage (SAH)
CT without contrast showing blood in basal and suprasellar cisterns, interhemispheric and sylvian fissures.

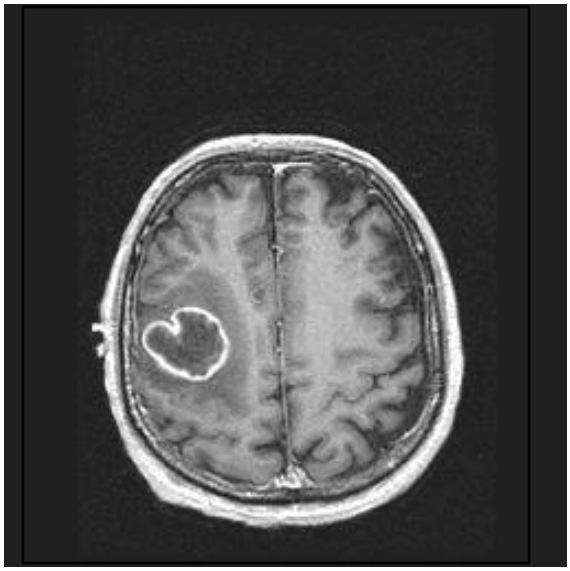
NS4. Acute Subdural Hemorrhage
Left increased density, concave mass usually less uniform, less dense, and more diffuse than epidural hemorrhage.
Note compression of ventricles and midline shift.

NS5. Chronic Subdural Hemorrhage
Bilateral hypodense areas representing old blood, mass effect.

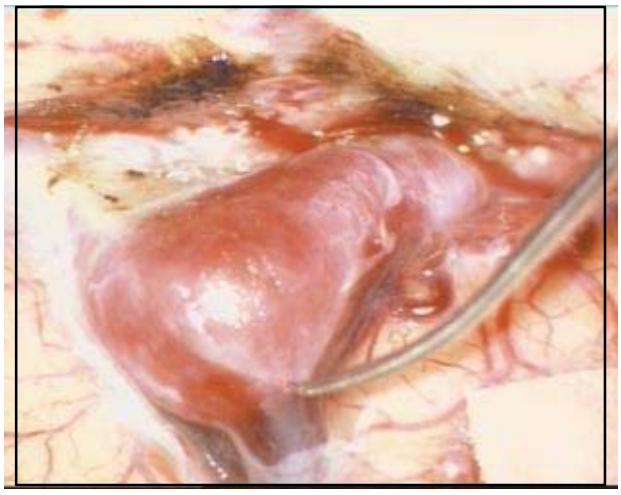
NS6. Chronic Subdural Hematoma (bilateral)
(Courtesy Dr. P. Porter)



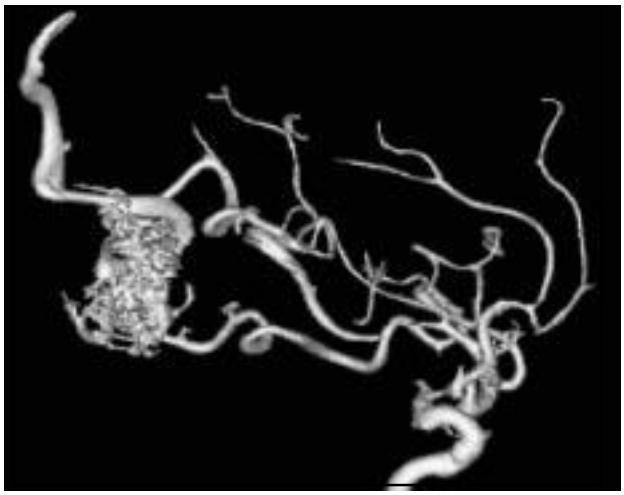
NS7. Left Temporal Contusion
Left temporal contusion with left uncal herniation;
(Courtesy Dr. P. Porter)



NS8. Right Frontoparietal Abscess
(Courtesy Dr. P. Porter)

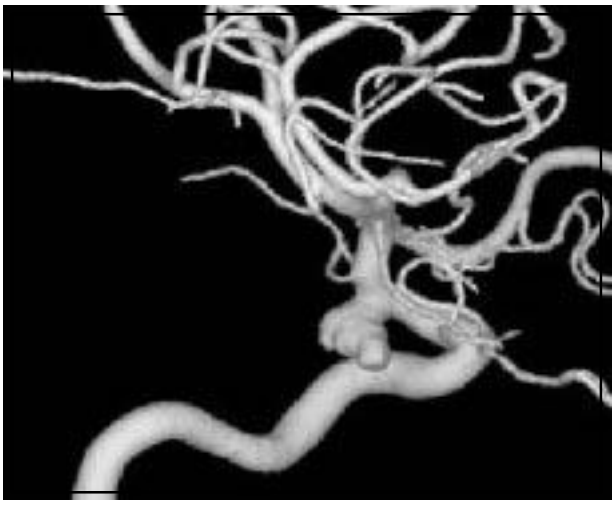


NS9. Arteriovenous Malformation (AVM)
Retractor is indicating junction between arterial and venous blood.
(Courtesy Dr. P. Porter)

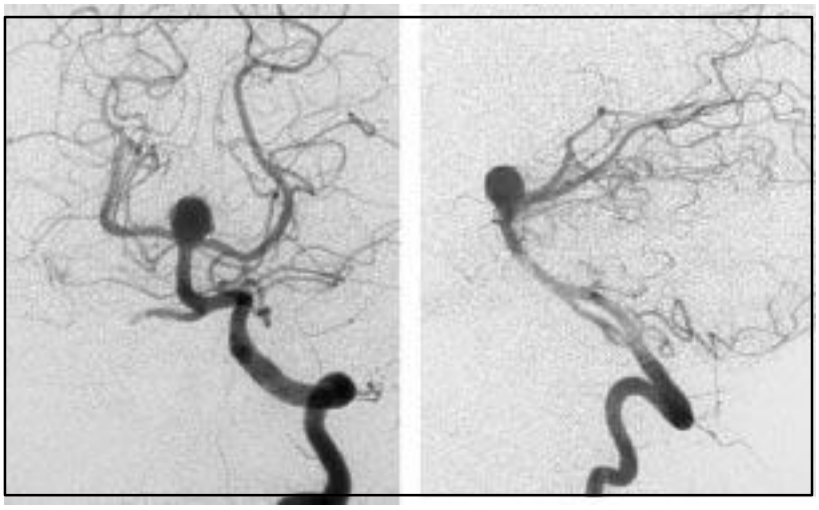


NS10. 3-D Angiogram
Arteriovenous malformation (AVM).
(Courtesy Dr. P. Porter)

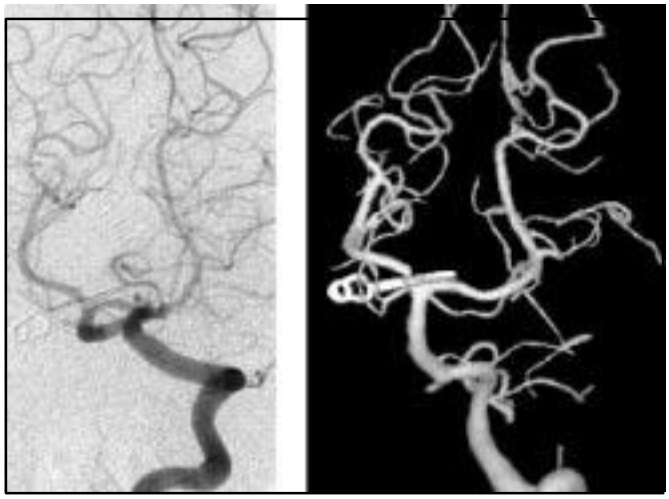
NS11. Intraoperative Arteriovenous Malformation (AVM)
(Courtesy Dr. P. Porter)



NS12. 3-D Angiogram
3-D angiogram of posterior communicating artery aneurysm.
(Courtesy Dr. P. Porter)

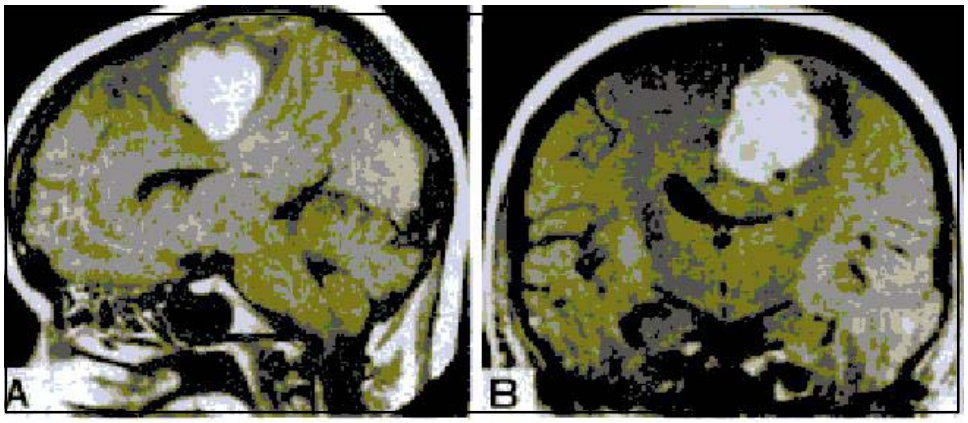


NS13. Angiogram of Basilar Artery Aneurysm
(Courtesy Dr. P. Porter)

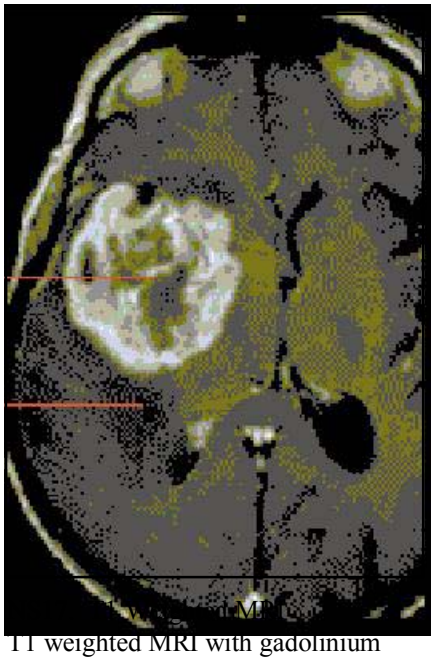


NS14. Angiograms of Basilar Artery Aneurysm Clipped
(Courtesy Dr. P. Porter)

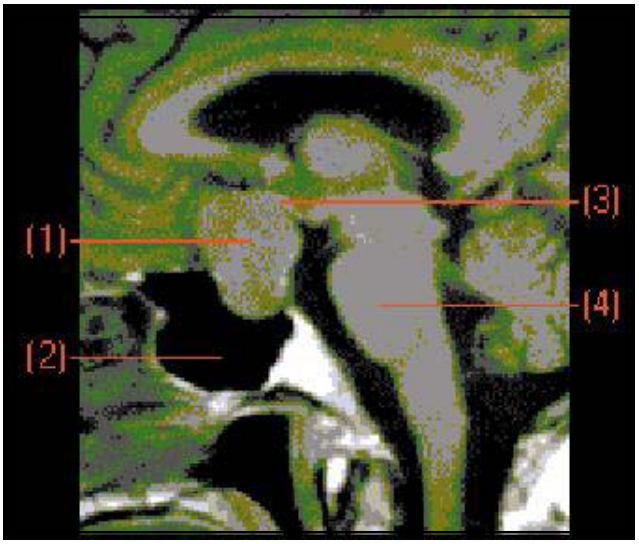
NS15. Intracranial Mass
Large glioma with midline shift and compression of sulci.
(Courtesy Dr. G. Olscamp)



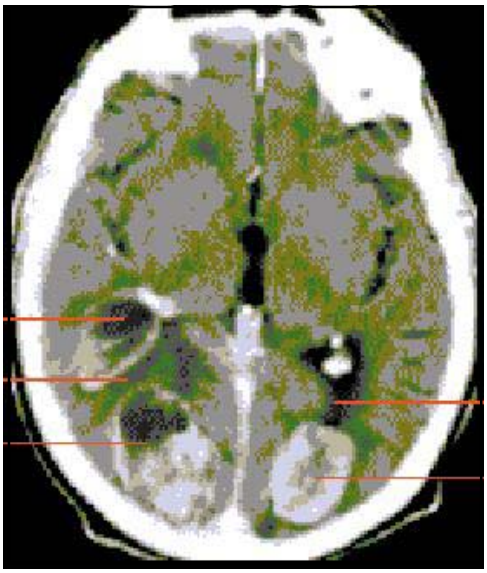
NS16. Left Falcine Meningioma
MRI showing sagittal (A) and coronal (B) images of a left falcine meningioma.
(Courtesy Dr. P. Porter)



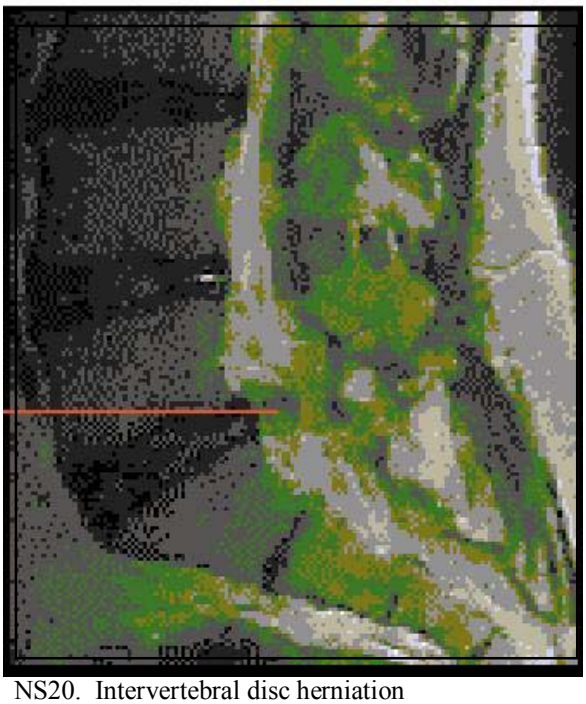
T1 weighted MRI with gadolinium showing glioblastoma multiforme.



NS18. Pituitary Macroadenoma
(1) Macroadenoma; (2) Sphenoid sinus;
(3) Compresssed optic chiasma; (4) Pons.

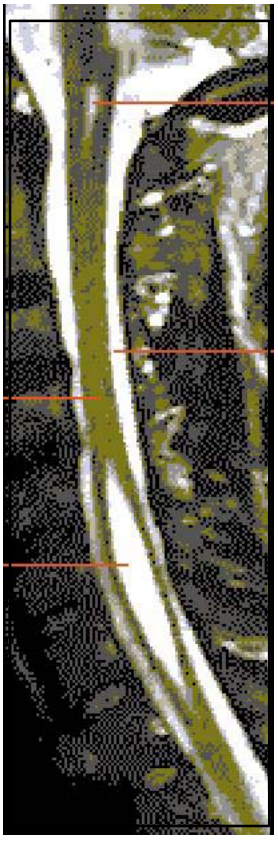


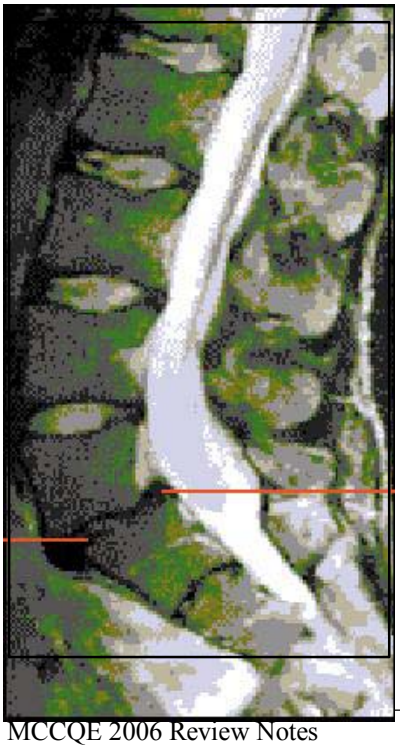
NS19. Multiple Brain Metastases



NS20. Intervertebral disc herniation

NS22. Syringomyelia
"Syrinx", cavitation of spinal cord substance.

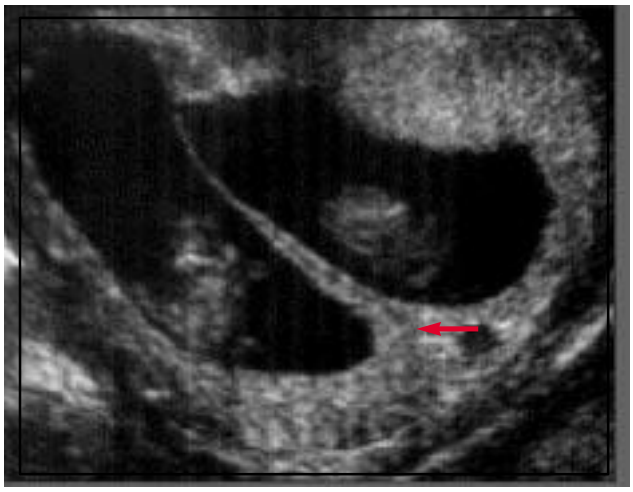




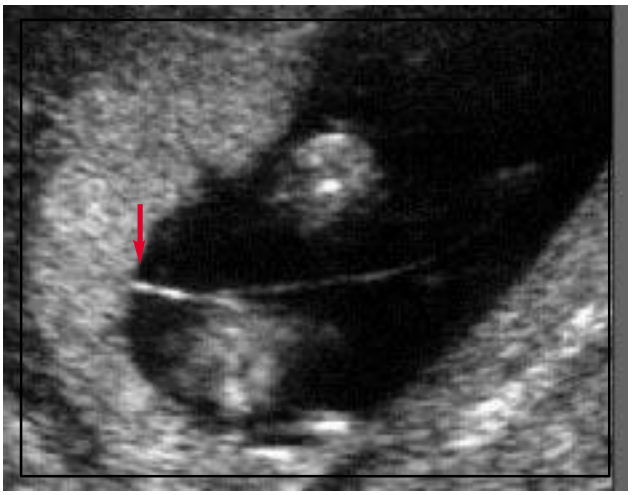
NS21.
Spondylolisthesis
Anterior subluxation of one vertebral body on another.

OB1. Cervix
(Courtesy of Dr. Seaward and Dr. Ryan, Fetal Medicine Unit, Mt Sinai Hospital)

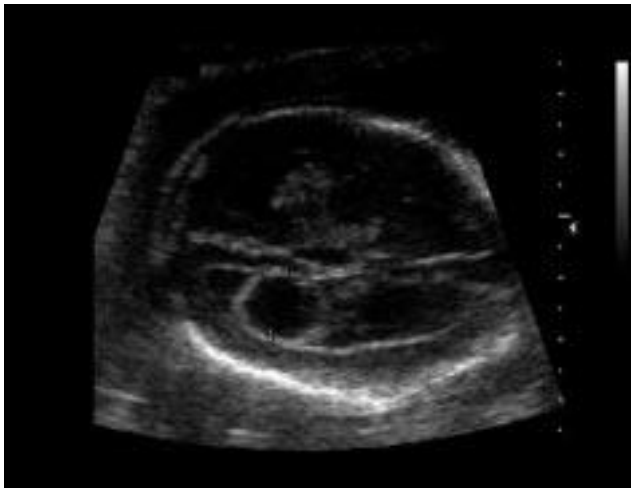
OB2. Placenta Previa
(Courtesy of Dr. Seaward and Dr. Ryan, Fetal Medicine Unit, Mt Sinai Hospital)



OB3. Dichorionic, Diamniotic Twins
Lambda Sign
(Courtesy of Dr. Seaward and Dr. Ryan, Fetal Medicine Unit, Mt Sinai Hospital)



OB4. Monochorionic, Diamniotic Twins
T Sign
(Courtesy of Dr. Seaward and Dr. Ryan, Fetal Medicine Unit, Mt Sinai Hospital)



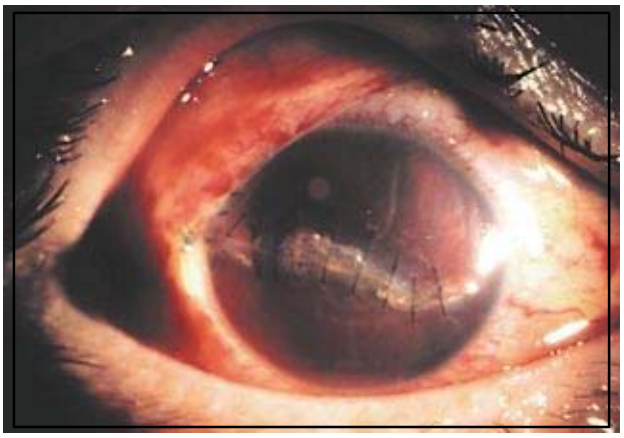
OB5. Choroid Plexus Cyst
(Courtesy of Dr. Seaward and Dr. Ryan, Fetal Medicine Unit, Mt Sinai Hospital)

OB6. Ventriculomegaly
(Courtesy of Dr. Seaward and Dr. Ryan, Fetal Medicine Unit, Mt Sinai Hospital)

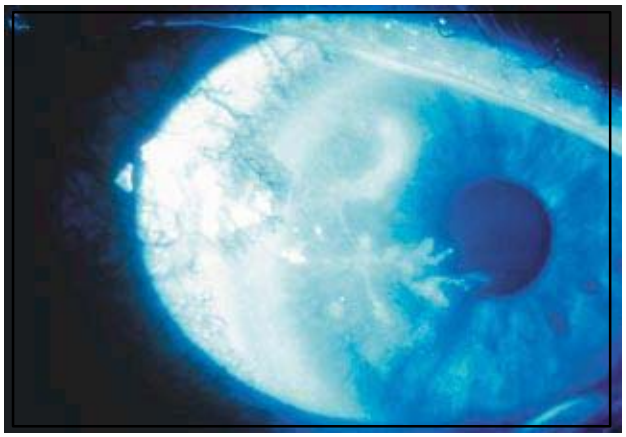
OB7. Nuchal Translucency
(Courtesy of Dr. Seaward and Dr. Ryan, Fetal Medicine Unit, Mt Sinai Hospital)

OB8. Nuchal Translucency
(Courtesy of Dr. Seaward and Dr. Ryan, Fetal Medicine Unit, Mt Sinai Hospital)

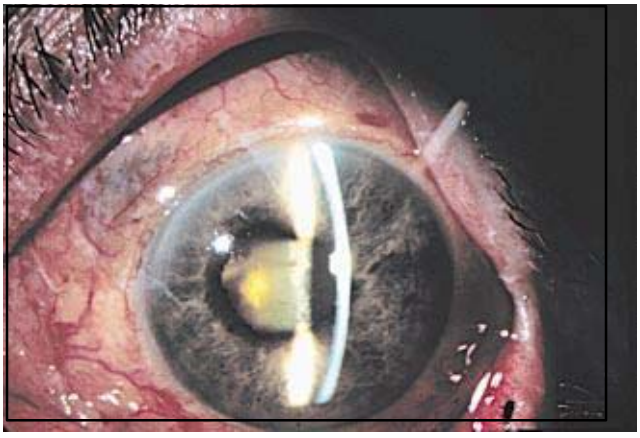
OP1. Dacryocystitis
Erythematous inflammation of the lacrimal sac.



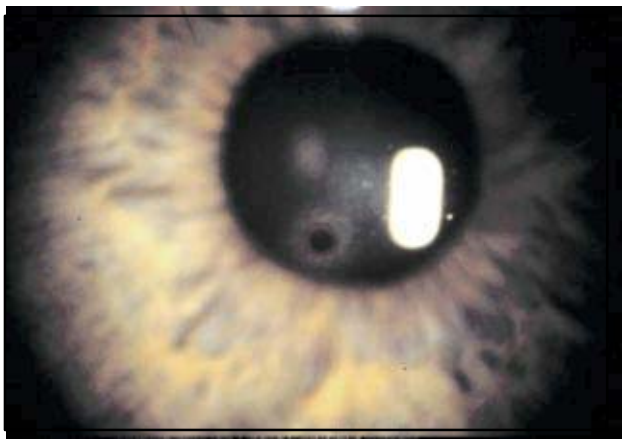
OP2. Corneal Laceration



OP3. Herpes Simplex
Irregular dendritic (branch-like) lesion of corneal epithelium stained with fluorescein.

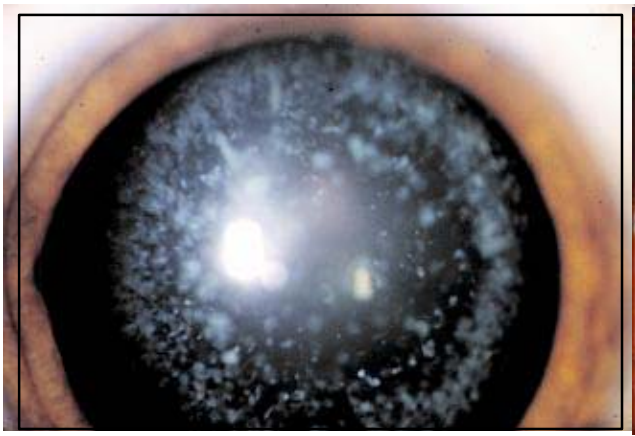


OP4. Iritis
Ciliary flush and constricted pupil.



OP5. Foreign Body
Presence of rust ring on cornea after removal of metallic foreign body.

OP6. Endophthalmitis with Hypopyon
Prominent layer of purulent material in inferior aspect of anterior chamber. Note corneal edema and conjunctival injection.

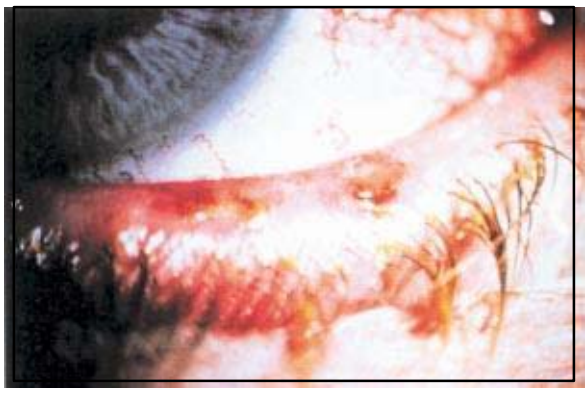


OP7. Cataract
Nuclear sclerosis with opacified lens.

OP8. Pterygium
Wedge-shaped growth of vascularized conjunctiva extending onto cornea.

OP9. Dacryoadenitis
Dacryocystitis with swelling over the lacrimal sac and tearing.
(Courtesy of Stein R, Stein H and Slatt B. Management of Occular Emergencies 2nd Ed.)

OP10. Chalazion
Chalazion characterized by localized lid swelling due to obstruction of a meibomian gland.
(Courtesy of Stein R, Stein H and Slatt B. Management of Occular Emergencies 2nd Ed.)



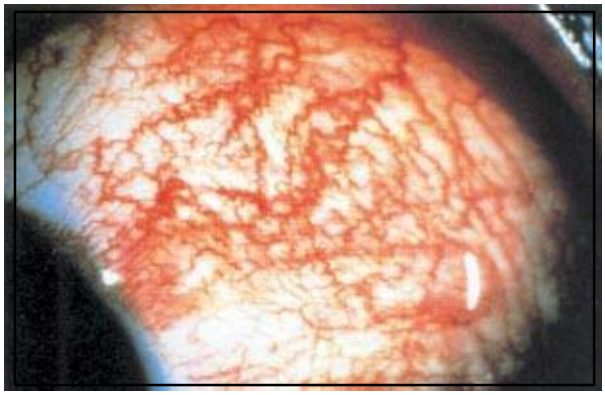
OP11. Blepharitis
Blepharitis as characterized by erythema of the lid margins and scales on the lashes.
(Courtesy of Stein R, Stein H and Slatt B. Management of Occular Emergencies 2nd Ed.)

OP12. Subconjuctival Hemorrhage
Subconjunctivital hemorrhage as evidenced by a bright red colour.
(Courtesy of Stein R, Stein H and Slatt B. Management of Occular Emergencies 2nd Ed.)

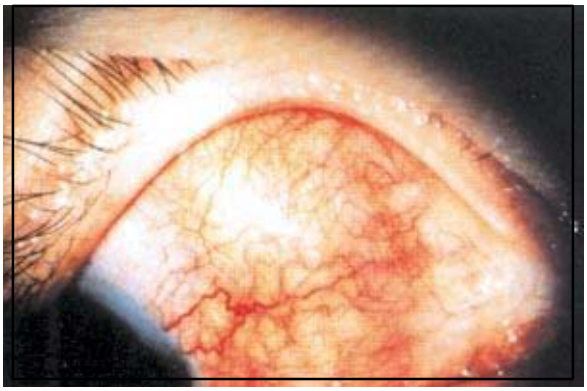
OP13. Bacterial Conjunctivitis
Bacterial conjunctivitis characterized by a purulent discharge that was due to gonorrhea.
(Courtesy of Stein R, Stein H and Slatt B. Management of Occular Emergencies 2nd Ed.)

OP14. Viral Conjunctivitis
Adenoviral conjunctivitis with lid swelling, conjunctival injection and tearing.
(Courtesy of Stein R, Stein H and Slatt B. Management of Occular Emergencies 2nd Ed.)

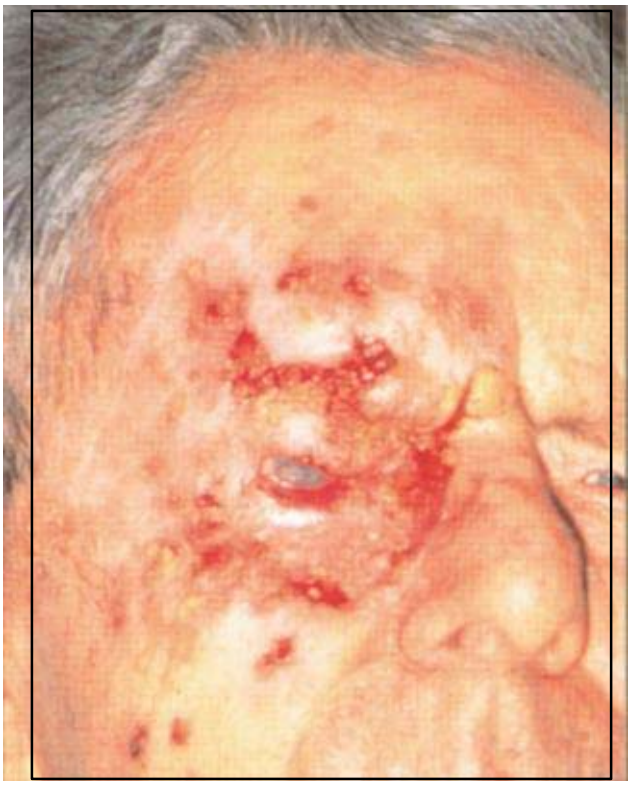
OP15. Allergic Conjunctivitis
Allergic conjunctivitis with swelling of the lids and conjunctiva.
(Courtesy of Stein R, Stein H and Slatt B. Management of Occular Emergencies 2nd Ed.)



OP16. Episcleritis
Episcleritis with sectorial injection of the conjunctiva and episcleral tissue.
(Courtesy of Stein R, Stein H and Slatt B. Management of Occular Emergencies 2nd Ed.)

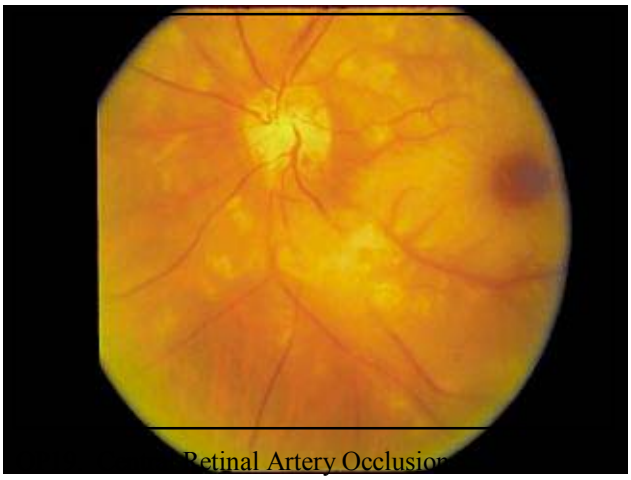


OP17. Scleritis
Scleritis with diffuse involvement on the deep episcleral vessels..
(Courtesy of Stein R, Stein H and Slatt B. Management of Occular Emergencies 2nd Ed.)

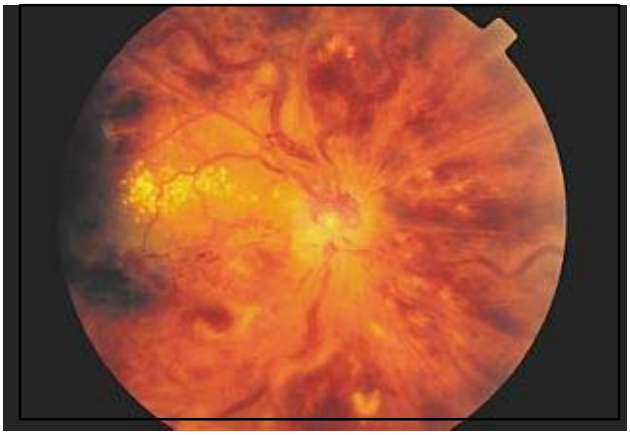


OP18. Herpes Zoster Keratitis
Herpes zoster ophthalmicus with trigeminal nerve distribution.
(Courtesy of Stein R, Stein H and Slatt B. Management of Occular Emergencies 2nd Ed.)

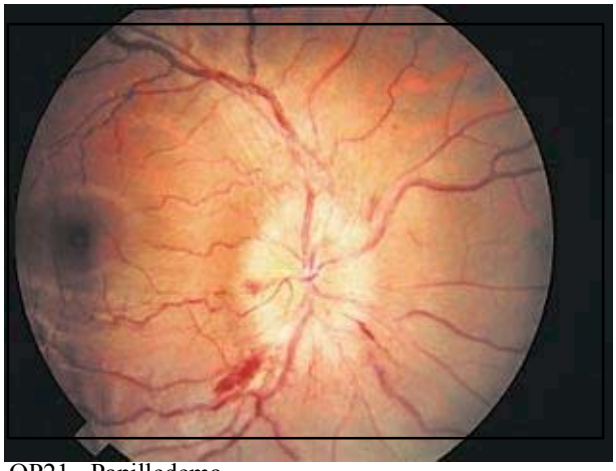
FUNDOSCOPY



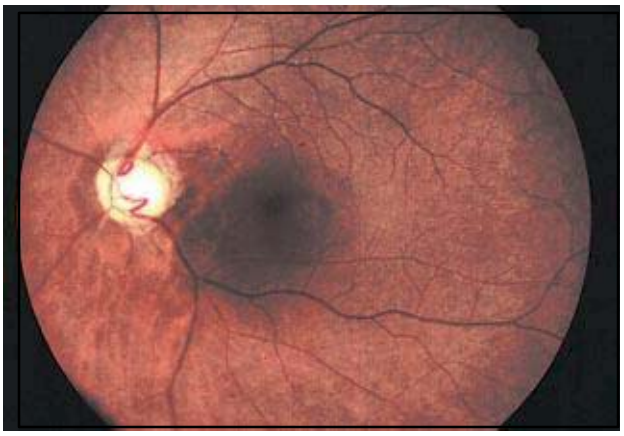
(CRAO)
Cherry red spot at fovea, constricted vessels, pale retina and disc.



OP20. Central Retinal Vein Occlusion (CRVO)
Swollen, blurred disc margin, red congested retina with flame-shaped hemorrhages.
"Blood and thunder" appearance.

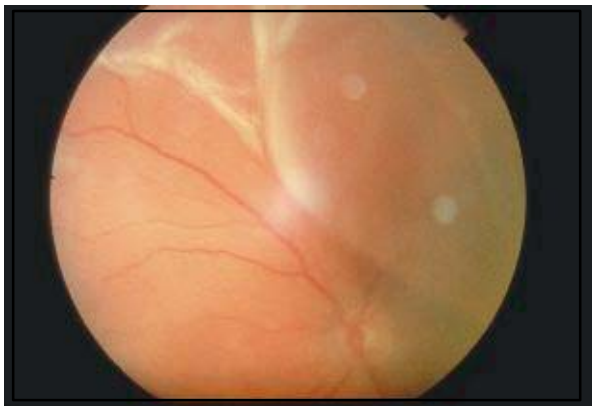


OP21. Papilledema
Elevated congested disc with indistinct margins, flame-shaped hemorrhages, and dilated tortuous vessels.

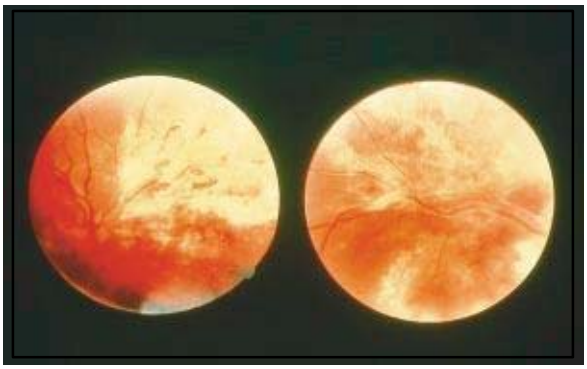


OP22. Optic Atrophy
Pallor of optic disc with sharp margins; attenuated vessels.

OP23. Proliferative Diabetic Retinopathy
Fan-shaped network of new blood vessels branching onto optic disc (neovascularization). Also note dot hemorrhages and microaneurysms.



OP24. Retinal Detachment
Bullous retinal detachment with retinal folds on temporal aspect.



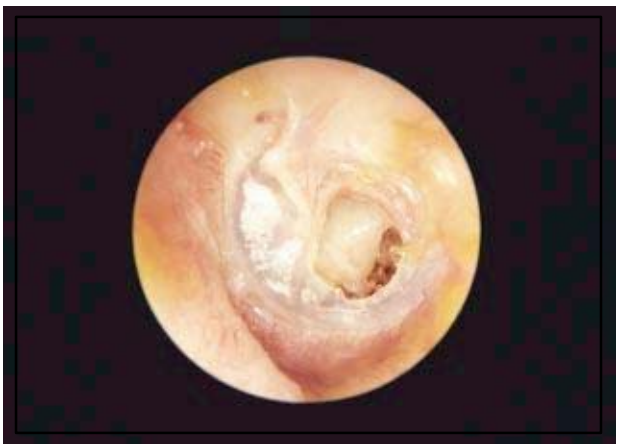
OP25. Cytomegalovirus Retinitis
White exudate surrounding hemorrhages and areas of necrosis. Distinct border between diseased and normal retina.

OP26. Glaucoma
Asymmetrical increase of cup:disc ratio (0.8). Cupping seen where vessels disappear over the edge of the attenuated rim.

OT1. Acute Otitis Media (AOM)
Bulging, hyperemic tympanic membrane with indistinct landmarks.

OT2. Serous Otitis Media
Air bubbles and serous fluid behind retracted amber tympanic membrane. *(Courtesy Dr. M. Hawke)*

OT3. Tympanostomy Tube
Plastic tube placed in inferior portion of tympanic membrane. *(Courtesy Dr. M. Hawke)*



OT4. Perforated Tympanic Membrane
(Courtesy Dr. M. Hawke)

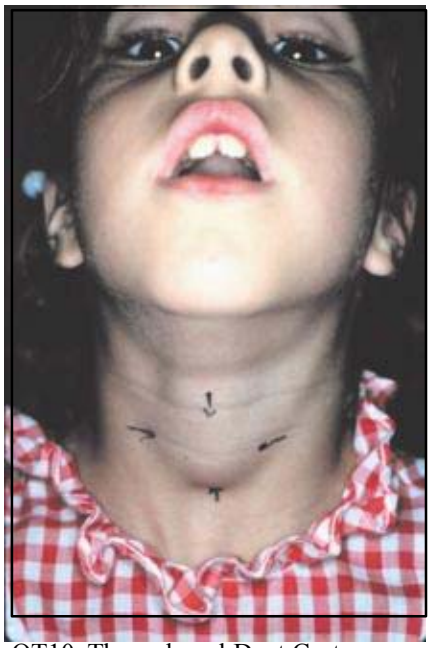
OT5. Cholesteatoma
Cyst-like mass lined with keratinized squamous epithelium and filled with desquamating debris in the middle ear. Progressive enlargement may lead to bony/soft tissue destruction. *(Courtesy Dr. M. Hawke)*

OT6. Nasal Polyps
Grape-like swellings hanging down from the sinuses into the nose. They are thought to result from an inflammatory response within the sinus mucosa.
(Courtesy Dr. M. Carr)

OT7. Exudative Tonsillitis
Enlarged and inflamed tonsils with purulent exudate in a patient with mononucleosis.
(Courtesy Dr. A. Waitzman)

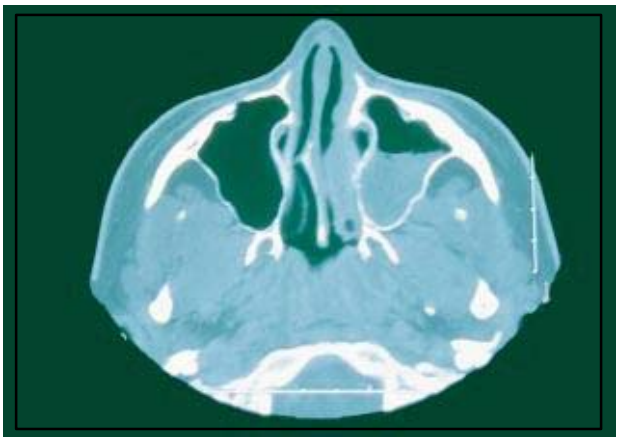
OT8. Carcinoma of Tongue
These are almost always squamous cell carcinomas (SCC) and occur as a result of exposure to tobacco, alcohol, and betel nut root.
(Courtesy Dr. D. Brown)

OT9. Bell's Palsy
Unilateral right facial nerve paralysis. Note patient smiling with mouth droop and loss of nasolabial fold. *(Courtesy Dr. A. Waitzman)*

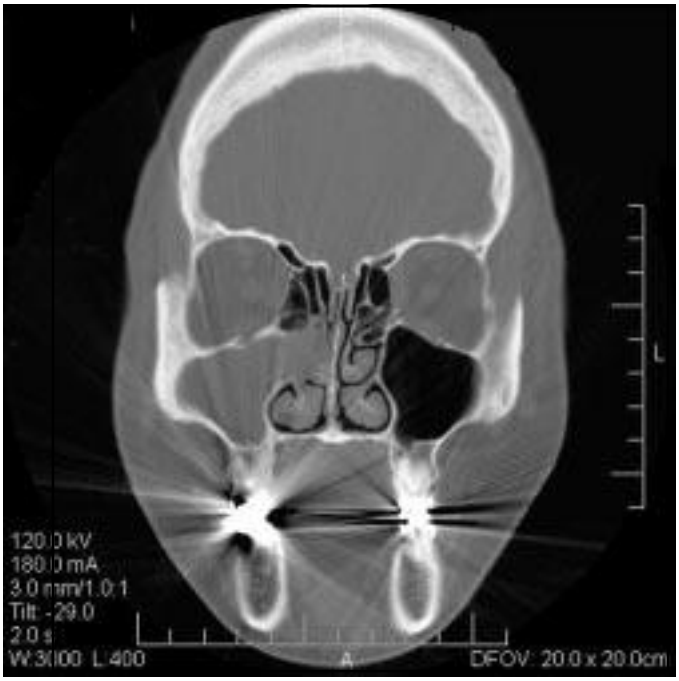


OT10. Thyroglossal Duct Cyst
Firm midline mass that moves up and down with swallowing.

OT11. Branchial Cleft Cyst
Persistence of branchial cleft remnant as firm cystic mass in lateral neck.



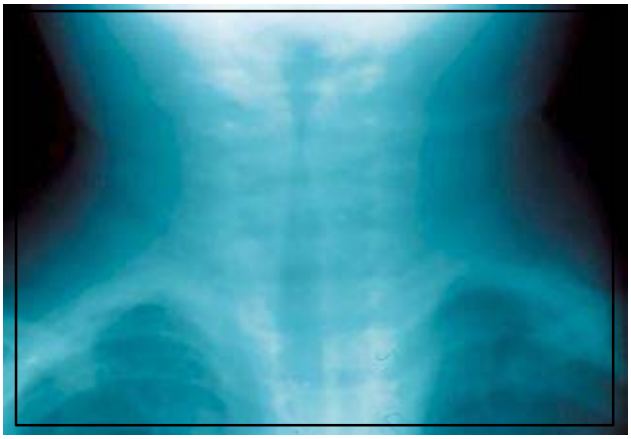
OT12. Maxillary Sinusitis (Axial CT scan)
Air-fluid level in left maxillary sinus.
(Courtesy Dr. A. Waitzman)



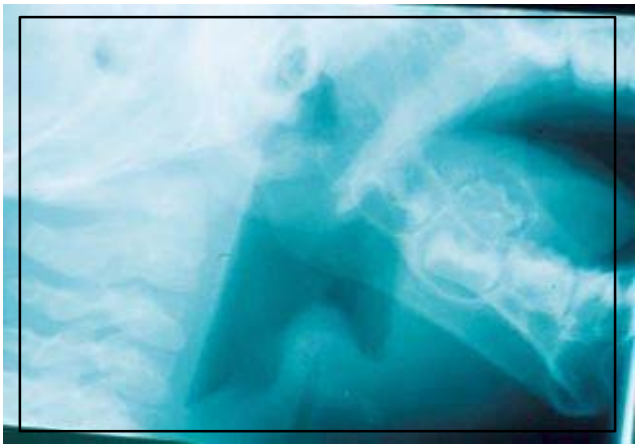
OT13. Maxillary Sinusitis (Coronal CT scan)
Right sided maxillary sinusitis.
(Courtesy Dr. M. Carr)

P1. Chicken Pox
Maculopapular rash on trunk progressing to vesicles and to crusts. *(Courtesy Dr. M. Mian)*

P2. Roseola
Diffuse maculopapular rash. *(Courtesy The Hospital for Sick Children Slide Library, Toronto)*

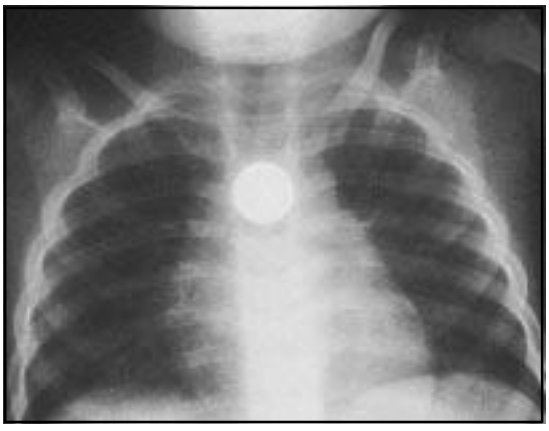


P3. Croup
"Steeple sign" showing inflammation of tissues in narrow subglottic space. *(Courtesy Dr. M. Mian)*



P4. Epiglottitis
"Thumb sign" showing a swollen epiglottis seen just at level of hyoid bone. *(Courtesy Dr. M. Mian)*

P5. Scarlet Fever
Strawberry tongue. (*Courtesy Dr. M. Mian*)



P6. Foreign Body
Coin lodged in esophagus.
(Courtesy Dr. A. Waitzman)

PL1. 1st degree burn
(superficial partial thickness)
Superficial partial thickness burn to forearm. Note the presence of unroofed blisters.

PL2. 2nd degree burn
(deep partial thickness)
Deep partial thickness burn to palm. The wound has a wet, variable appearance, with both pale and red areas.

PL3. 3rd degree burn
(full thickness)
Full thickness burn to dorsum of hand. Thrombosed vessels and underlying adipose tissue are clearly visible.

PL4. Venous Stasis Ulcer
(Courtesy Dr. A. Freiberg)

PL5. Arterial Ischemic Ulcer
(Courtesy Dr. A. Freiberg)

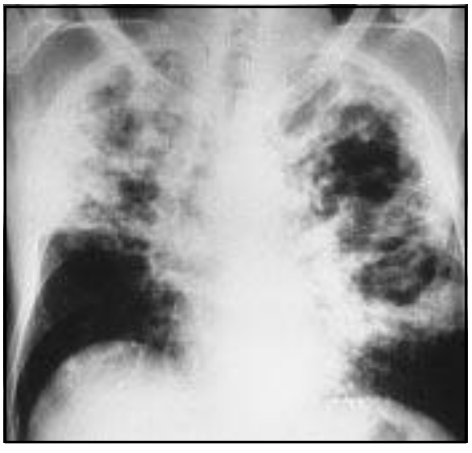
R1. Interstitial Disease
Diffuse reticulonodular markings prominent in the lower lung zones; linear strands and spherical densities.
(Courtesy Dr. M. Hutcheon)

R2. Airspace Disease
Ill-defined fluffy structures with confluences +/– air bronchograms. *(Courtesy Dr. M. Hutcheon)*

R3. Congestive Heart Failure (CHF) (PA film)
Cardiomegaly, pulmonary congestion, blunting of costophrenic angles, and loculated pleural effusion.

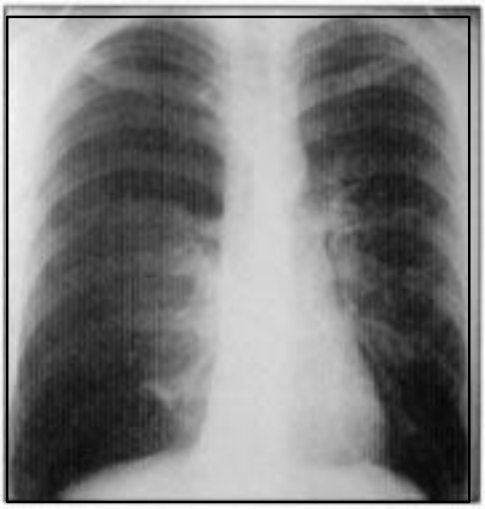
R4. Congestive Heart Failure (CHF)
(Lateral film)
Post-treatment for CHF. Note scant effusion within fissure lines.

R5. Wegener's Granulomatosis
Patchy alveolar infiltrates, widely distributed multiple irregular masses ± pleural effusion and ± thick-walled cavities. *(Courtesy Dr. M. Hutcheon)*



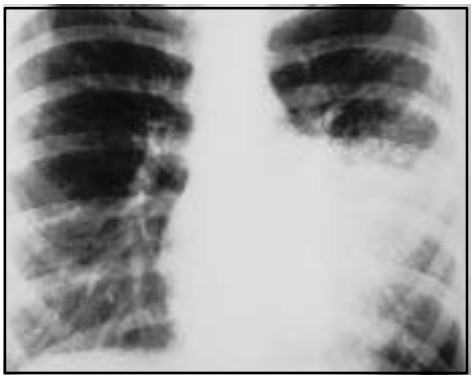
R6. Active Tuberculosis
Cavitation in apical regions and posterior segments of upper lobe ± calcification.
(Courtesy Dr. M. Hutcheon)

R7. Bronchogenic Carcinoma
Ill-defined infiltrating lesion in left hilar region.



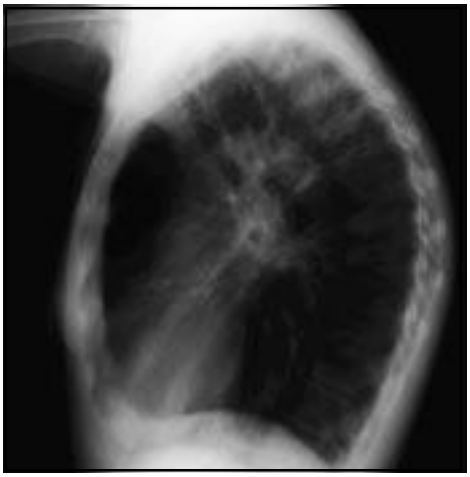
R8. Pneumothorax
Separation of visceral and parietal pleura. Note hyperlucent lung field and small, deflated lung on right with lack of peripheral lung markings.
(Courtesy Dr. G. Olscamp)

R9. Pneumocystis carinii Pneumonia
Bilateral interstitial and alveolar infiltrates with typical sparing of apices. Arrow showing pneumothorax.



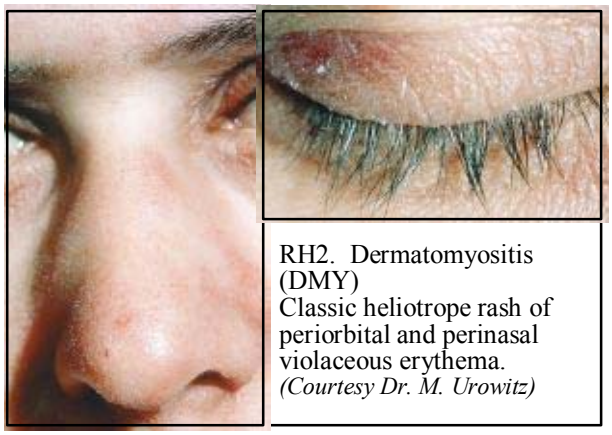
R10. Bacterial Pneumonia
"Silhouette sign" (loss of normally appearing profiles). Unilateral localized infiltrate involving lingula and obliterating left heart border.

R11. Emphysema (PA film)
Hyperinflation, darkened lung fields, vascular redistribution.

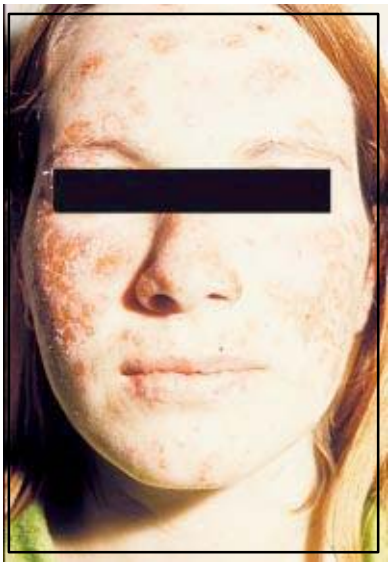


R12. Emphysema (Lateral film)
Large retrosternal airspace, increased AP diameter "barrel chest", flattened hemi-diaphragms.

RH1. Systemic Lupus Erythematosus (SLE)
Prominent scaly fixed erythema, flat or raised over malar eminences, tending to spare nasolabial folds ("butterfly rash").



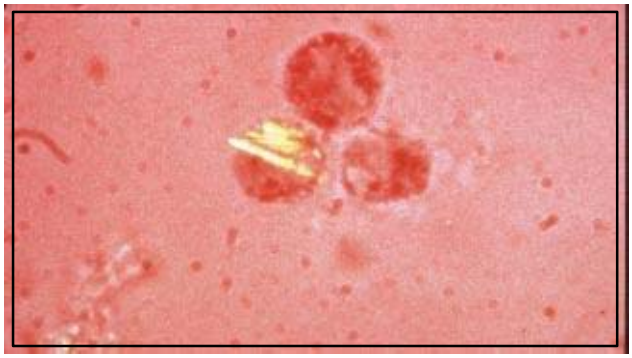
RH2. Dermatomyositis (DMY)
Classic heliotrope rash of periorbital and perinasal violaceous erythema.
(Courtesy Dr. M. Urowitz)



RH3.
Discoid Lupus Erythematosus
Violaceous, hyperpigmented, atrophic plaques; keratotic scale with follicular plugging and scarring.
(Courtesy Dr. L. From)

RH4. Dermatomyositis (DMY) (Hands)
Erythematous flat-topped scaling papules over the knuckles showing Gottron's papules and periungal telangiectasia. (*Courtesy The Hospital for Sick Children Slide Library, Toronto*)

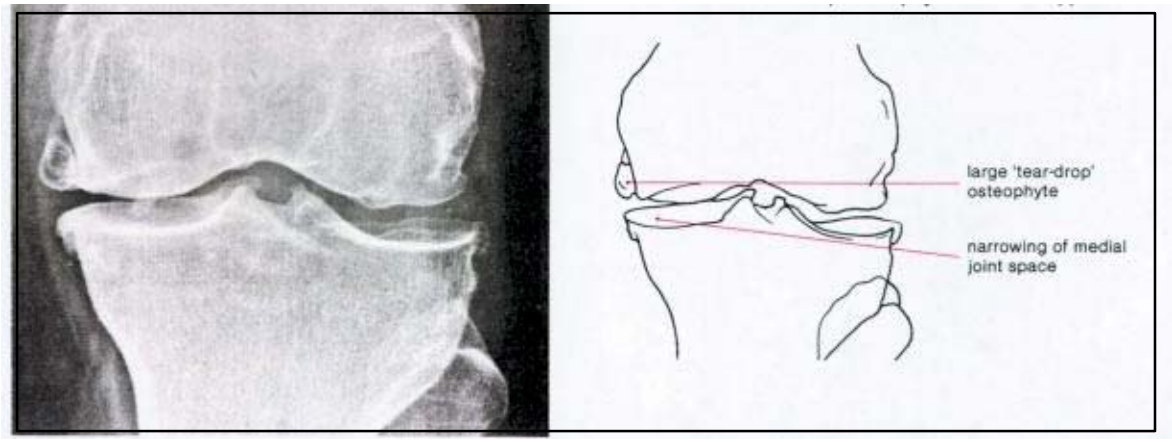
RH5. Acute Gouty Arthritis
Classic inflammation resembling cellulitis of the first metatarsophalangeal (MTP) joint, referred to as podagra. The first MTP is the most common site of initial involvement. *(Courtesy Dr. A. Fam)*



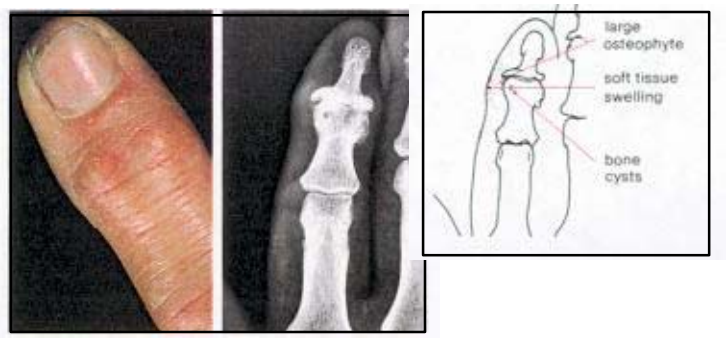
RH6. Acute Gout
Monosodium Urate Crystals
Polarized light microscopy showing monosodium urate crystals. Note the negative birefringence (yellow) of needle-shaped crystals versus the rhomboid-shaped and positively birefringent (blue) crystals of crystal pyrophosphate disease (CPPD).
(Courtesy Dr. A. Fam)

RH7. Vasculitis
Note purpuric papules. *(Courtesy Dr. A. Fam)*

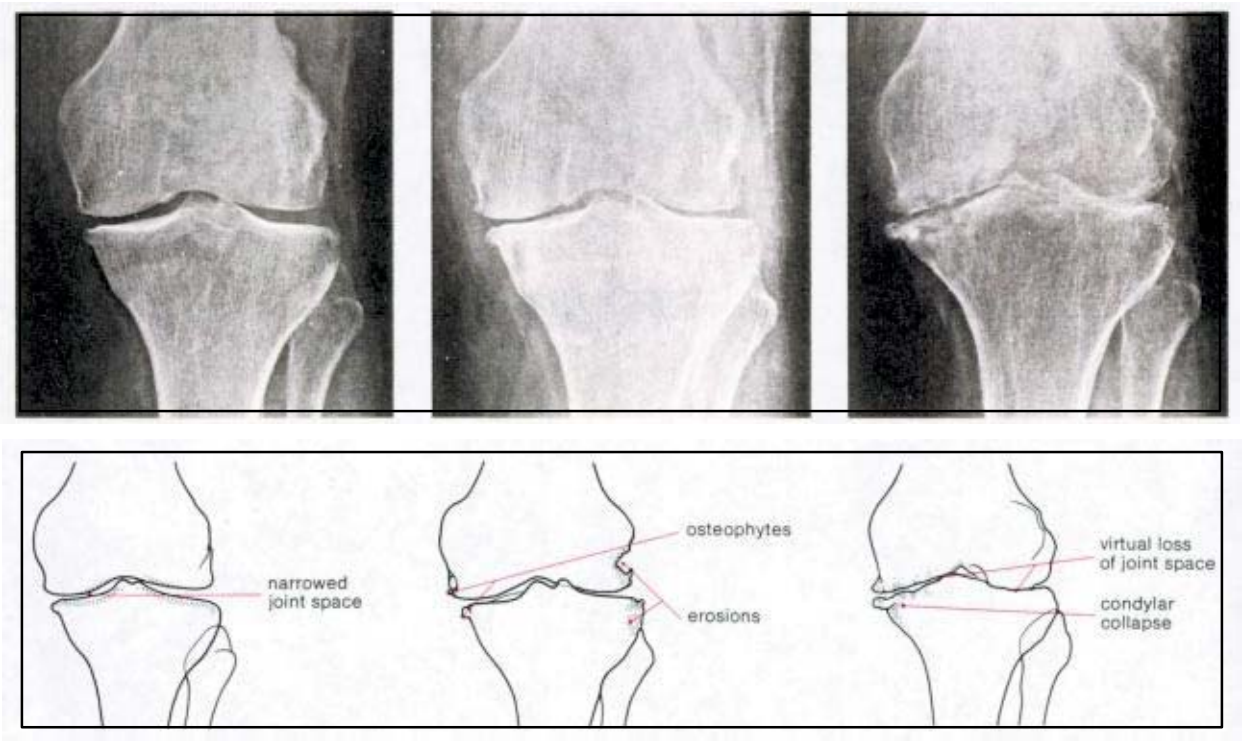
RH8. Scleroderma
Sclerodactyly showing bilateral swelling, a shiny wax-like appearance, and tapering of the fingers. May also note digital ulcers, nailfold telangiectasia, and periarticular calcinosis. Flexion contractures present in advanced disease. *(Courtesy Dr. A. Fam)*



RH9. Osteoarthritis - Typical X-Ray Findings
Plain film of the knee in moderate OA showing joint space narrowing and subchondral sclerosis. The characteristic "tear drop" osteophytes are also apparent. *(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 15.41)*



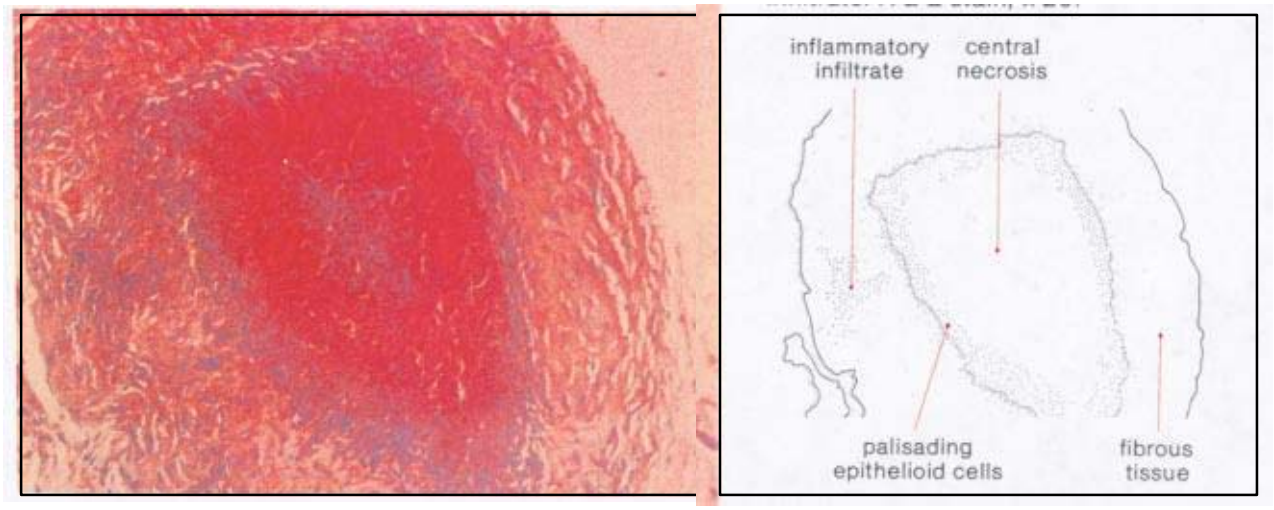
RH10. Osteoarthritis - Heberden's Nodes
Osteoarthritis at the distal interphalangeal (DIP) joint. The characteristic clinical finding is hard swelling on either side of the dorsum of the DIP (Heberden's nodes) (left). The characteristic radiological changes include the osteophytic lipping, scerlosis and joint space narrowing (right). *(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 15.43)*



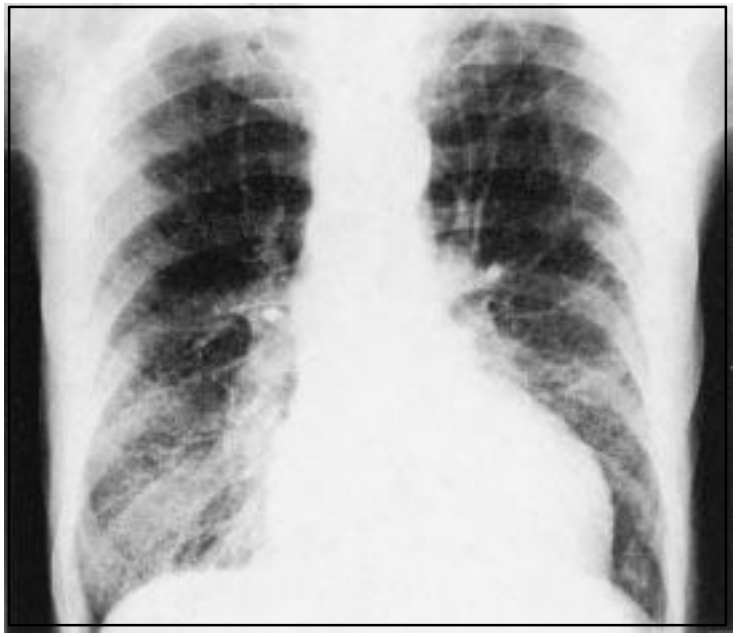
RH11. Rheumatoid Arthritis - Typical X-Ray Findings
A series of knee radiographs in rheumatoid arthritis. Early disease with minimal joint space narrowing (left), further joint space narrowing, some marginal osteophytes and erosions, particularly laterally (middle), and the virtual loss of joint space and collapse of the tibial condyles with some erosive changes in the medial plateau (right). *(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 5.8)*

RH12. Rheumatoid Arthritis - Typical hand Changes
Characteristic findings in the rheumatoid hand include subluxation of the metacarpophalangeal (MCP) with ulnar deviation.
(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 4.22)

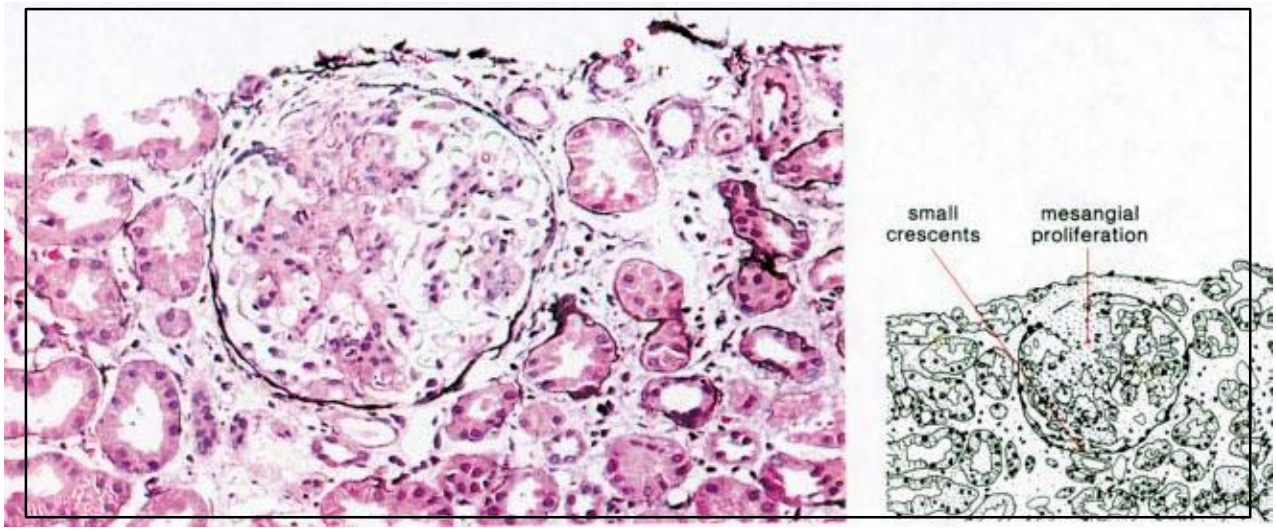
RH13. Rheumatoid Nodule
Rheumatoid nodules. *(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 2.51)*



RH14. Pathology of the Rheumatoid Nodule
Characteristic histological features of a rheumatoid nodule showing central necrosis, palisading epitheloid cells with some surrounding fibrous tissue and a sparse inflammatory infiltrate. H & E stain, x 20 maginfication. *(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 3.21)*



RH15. Rheumatoid Lung Changes
Widespread bilateral basal intestitial fibrosis, most prominent in the lower and middle zones, due to fibrosing alveolitis in a rheumatoid patient. *(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 7.34)*

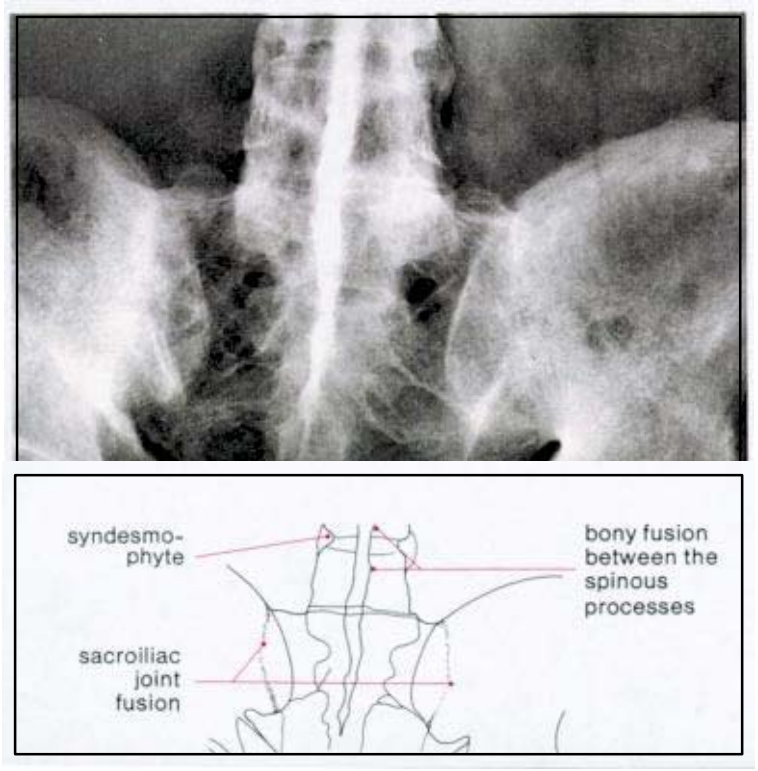


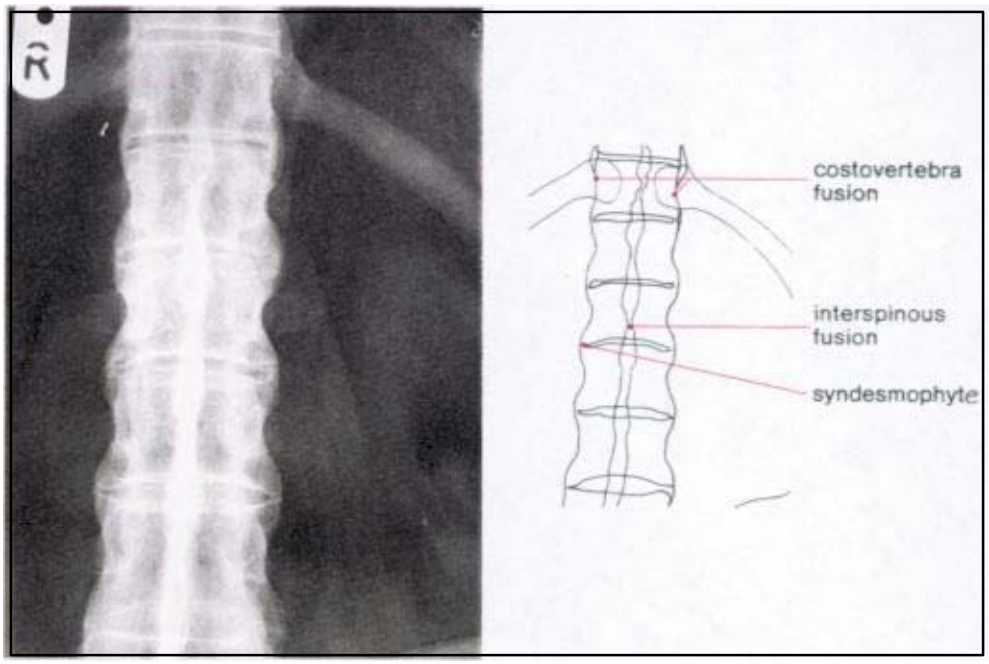
RH16. Systemic Lupus Erythematosus - Proliferative Glomerulonephritis
Renal histology showing focal and mesangial proliferative glomerulonephritis with small crescent.
H & E stain, x 500 maginfication. *(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing.*
Figure 8.35)

RH17. Discoid Lupus
Multiple discoid lupus lesions on the arms.
(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 9.5)

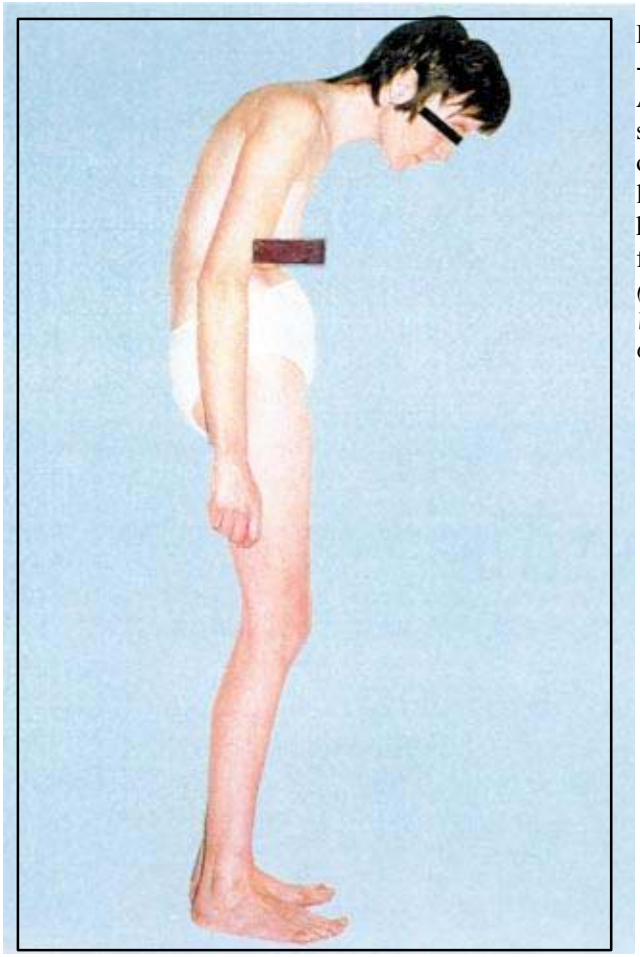
RH18. Scleroderma Facies
The face in scleroderma showing the typical microstomia with angular creases and tightness of the facial skin with telangiectasia on the cheek and the forehead. *(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 10.16)*

RH19. Sacroilitis
Pelvic radiograph in severe ankylosing spondylitis (AS) showing fusion of the sacroiliac joints syndesmophytes and spinous processes.
(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 12.2)

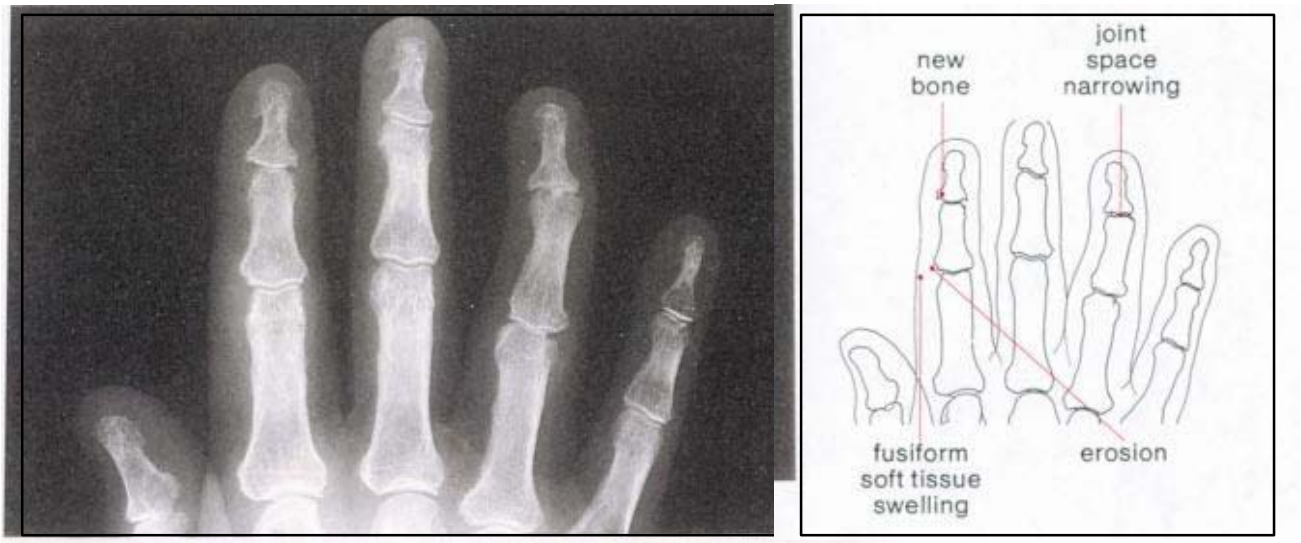




RH20. Ankylosing Spondylitis (AS) - Bamboo Spine
Lumbar spine radiograph showing extensive bony ankylosis in a typical "bamboo spine" pattern. Note also the ossification of the dorsal interspinous ligament and fusion at the costovertebral joints at T12. The changes are symmetrical at all levels.
(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 12.32)

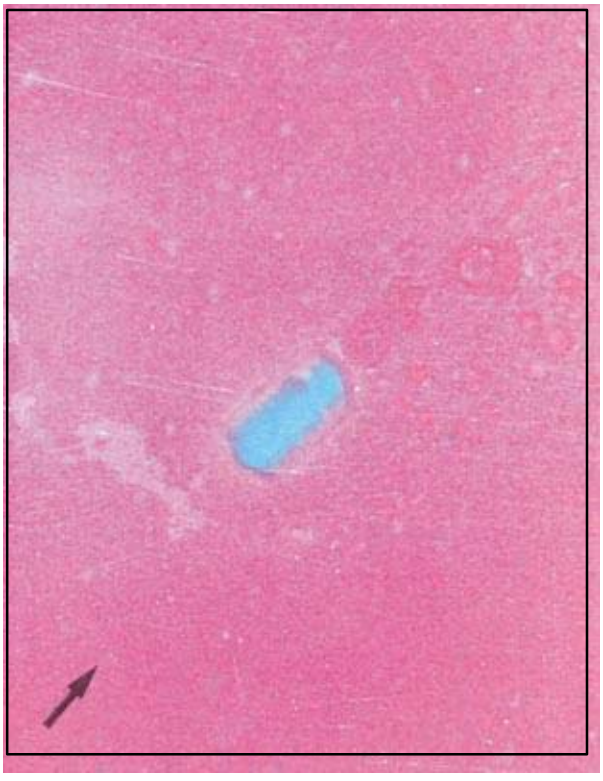


RH21. Ankylosing Spondylitis (AS) - Typical Posture
A patient with severe ankylosing spondylitis. Characteristic features of her posture include flattened lumbar lordosis, severe dorsal kyphosis, prominent abdominal folds and flexed knees.
(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 12.1)

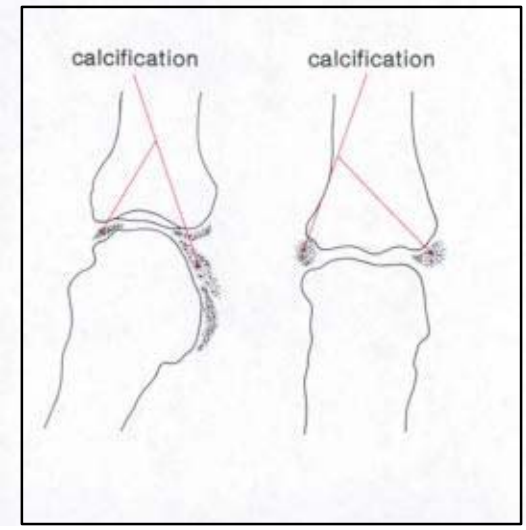


RH22. Psoriatic Arthritis - Characteristic Hand X-Ray Findings
Hand radiograph in psoriatic arthritis showing distal interphalangeal (DIP) erosions and associated bone proliferation. Joint space narrowing is present together with fusiform soft tissue swelling of the fingers.
(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 13.7)

RH23. Psoriatic Skin Rash
Psoriatic plaque over the extensor surface of an elbow.
(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 13.25)



RH24. Pseudogout - Calcium Pyrophosphate Disease (CPPD) Crystals
Calcium pyrophosphate crystals under high power polarized light microscopy.
(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 19.30)



RH25. X-Ray Findings in Chondrocalcinosis
Chondrocalcinosis in a patient who developed actue inflammation of a single proximal interphalangeal (IP) joint after a hernia operation: metacarpophalageal (MCP) joint (left) and proximal interphalangeal (PIP) joint (right). Pyrophosphate crystals were found in the synovial fluid. *(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing.Figure 19.28)*

RH26. Septic Arthritis - Dactylitis
Gonococcal arthritis: dactylitis of the ring finger due to tenosynovitis. *(From Dieppe PA, Bacon PA, Bamji AN and Watt I. 1986. Atlas of Clinical Rheumatology. Gower Medical Publishing. Figure 16.29)*

U1. Ureteric Calculus
Small stone seen at right pelvic brim.

U2. Ureteric Obstruction
Intravenous pyelogram (IVP) (1 hour post-dye injection) showing right hydronephrosis, hydroureter, dilated renal pelvis and calyx.